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SUPREME COURT OF THE UNITED STATES.

No. 52.

THE CHESAPEAKE AND OHIO CANAL COMPANY, PLAINTIFFS IN ERROR,

VERSUS

ABRAHAM KNAPP ET AL.

ERROR TO THE CIRCUIT COURT U. S. FOR THE COUNTY OF WASHINGTON, D. C.

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Style of the Court.

District of Columbia, sct.

At a circuit court of the District of Columbia, begun and held in and for the county of Washington, at the city of Washington, on the fourth Monday of March, being the twenty-fourth day of the same month, in the year of our Lord one thousand eight hundred and thirty-four, and of the Independence of the United States, the fifty-eighth.

Present,

The Honorable { WILLIAM CRANCH, Esq. Chief Judge, BUCKNER THRUSTON and JAMES S. MORSELL, } Assistant Judges.

ALEXANDER HUNTER, Esq., *Marshal.*

WILLIAM BRENT, *Cl'k.*

In the records of the proceedings of the said court, among others are the following, to wit:

FORD, CHAPMAN et al. use of JOEL CRUTTENDEN, plaintiffs, }
vs. }
The CHESAPEAKE and OHIO CANAL COMPANY, defendants. }

Be it remembered, that heretofore, to wit: On the twenty-first day of May, in the year of our Lord one thousand eight hundred and thirty-three, the said parties, by their attornies, filed in court here the following agreement, to wit:

Agreement.

It is agreed to docket the above suit on the imparlance docket of the present (March) term, and that a copy of the writs, declarations, and other proceedings in the same cause, in Montgomery and Ann Arundle counties, Maryland, may be filed in this court, and the proceedings continued thence to joining issue, and the cause be placed upon the trial docket of next term; and all depositions which may be taken prior to next term may be read on said trial.

RICHARD S. COXE, *for Def'ts.*
F. S. KEY, *for Plff's.*

April 9th, 1833.

It is agreed that on the filing of said papers, a rule be entered on plaintiffs, to file a bill of particulars of their claim.

COXE, *for Def'ts.*

It is also agreed, that the clerk may open all depositions in vacation, so that each party may see and have access to the same, and which shall be entitled to be read the same as if they had been previously opened in court.

COXE, *for Def'ts.*
F. S. KEY, *for Plffs.*

Thereupon, further process of and upon the premises aforesaid, between the parties aforesaid, by consent of the said parties, and their attornies afore-

said, and by order of the court here thereon, is continued until the fourth Monday of November next.

Continued to November term, 1833.

At which mentioned fourth Monday of November, in the year of our Lord one thousand eight hundred and thirty-three, to which day the said cause was continued, comes again into the circuit court here, as well the said plaintiffs, by their attorney aforesaid, as the said defendants, by their attorney aforesaid, and the said parties, by their attorneys aforesaid, in pursuance of the above agreement, file in court here the following proceedings from Ann Arundel county, to wit:

Style of the Court.

STATE OF MARYLAND, *Montgomery County, sct.*

At a county court, begun and held at the court-house in Rockville, in and for said county, on the first Monday of March, being the fifth day of the month, in the year of our Lord one thousand eight hundred and thirty-two.

Were present,

The Honorable { THOMAS B. DORSEY, Chief Judge, CHARLES J. KILGOUR, THOMAS H. WILKINSON, } Assistant Judges.

WILLIAM O'NEALE, Jr., *Sheriff.*
BRICE SELBY, *Clk.*

In the record of proceedings of the same court, among others is the following, to wit:

ABRAHAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN, use of JOEL CRUTTENDEN, plaintiffs,
against
The CHESAPEAKE and OHIO CANAL COMPANY, defendants.

Montgomery County, sct.

Be it remembered, that heretofore, to wit, on the twenty-first day of May, in the year of our Lord one thousand eight hundred and thirty-one, the said Abraham Knapp, Benjaminn Ford, Henry Acker, and Fredus Chapman, by Benja. S. Forrest and William M. Stewart, their attorneys, prosecuted and sued forth out of the circuit court here the writ of the State of Maryland of subpœna, to the sheriff of the county aforesaid directed, in the words and of the tenor following, to wit:

The State of Maryland, Montgomery County, to wit:

Subpœna.

To the sheriff of Montgomery county, greeting:

[L. S.] You are hereby commanded to summon the Chesapeake and Ohio Canal Company, that all excuses and ailings set aside, they be and appear before our next county court, to be held at the court-house in Rockville, in and for said county, on the second Monday of November next, to answer Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, in a plea of trespass on the case, and so forth.

Hereof they are not to fail, and fail not at your peril, and have you then and there this writ.

Witness the Honorable Thomas B. Dorsey, chief judge of our said court, the 7th day of March, 1831.

Issued the 21st day of May, 1831.

FORREST.
BRICE SELBY, *Clerk.*

November Term, 1831.

At which said second Monday of November, being the fourteenth day of the same month, in the year of our Lord one thousand eight hundred and thirty-one, and the day of the return of the aforegoing writ, comes into the circuit court here, the said Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, and the said sheriff of the county aforesaid, to whom the said writ was in form aforesaid directed, makes return thereof to the court here thereon, thus endorsed, to wit:

Sum'd, WILLIAM O'NEALE, Jr., *Sheriff.*

And the said Chesapeake and Ohio Canal Company being so forewarned, appeared in court here by Richard S. Coxe, their attorney, and, thereupon, the said Chesapeake and Ohio Canal Company, by their said attorney, pray that the said Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, may declare against them, the said Chesapeake and Ohio Canal Company, in the plea aforesaid.

Rule, Nar., and Imparlance to March Term, 1832.

Whereupon, it is ruled by the court here, that the said Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman declare against the said Chesapeake and Ohio Canal Company in the plea aforesaid; and if the said Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman do not declare against the said Chesapeake and Ohio Canal Comapny, in the plea aforesaid, judgment will be rendered against them by default; and the said Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, by their attornies aforesaid, pray leave of the court to imparle until the first Monday of March next, to declare against the said Chesapeake and Ohio Canal Company, in the plea aforesaid, and they have it; the same day is given to the said Chesapeake and Ohio Canal Company then &c.

At which said first Monday of March, being the fifth day of the same month, in the year of our Lord one thousand eight hundred and thirty two, until which day the said Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, had leave to imparle, and then to declare against the said Chesapeake and Ohio Canal Company, in the plea aforesaid, comes again into court here, as well the said Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, by their attorney aforesaid, as the said Chesapeake and Ohio Canal Company, by Richard S. Coxe and Clement Coxe, their attornies; and the said Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, declare in court here against the said Chesapeake aud Ohio Canal Company in the plea aforesaid as follows, to wit:

STATE OF MARYLAND, *Montgomery county, to wit:*

Nar.

The Chesapeake and Ohio Canal Company, late of Montgomery county,

were summoned to answer unto Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, in a plea of trespass on the case, and so forth. Whereupon the said plaintiffs, by B. S. Forrest, their attorney, complain, that whereas the said defendant, on the first day of January, in the year of our Lord one thousand eight hundred and thirty-one, at the county aforesaid, were indebted unto the said plaintiffs in the sum of fifty thousand dollars, current money, for sundry matters and articles, properly chargeable in account, as by a particular account thereof herewith into court exhibited appears; and so being indebted, the said defendants, in consideration thereof afterwards, to wit, on the day and year aforesaid, at the county aforesaid, undertook and faithfully promised the said plaintiffs, to pay them the aforesaid sum of money when they should be thereto afterwards required.

And whereas the said defendants afterwards, to wit, on the same day and year aforesaid, at the county aforesaid, were indebted unto the said plaintiffs in another sum of fifty thousand dollars, like money, for divers goods, wares, and merchandizes by the said plaintiffs before that time sold and delivered to the said defendants, at their special instance and request; and being so indebted, the said defendants, in consideration thereof afterwards, to wit, on the same day and year aforesaid, at the county aforesaid, undertook and promised the said plaintiffs to pay them the last aforesaid sum of money, when they should be thereto afterwards required.

And whereas afterwards, to wit, on the same day and year aforesaid, at the county aforesaid, in consideration that the said plaintiffs, at the instance and request of the said defendants, had before that sold and delivered to the said defendants divers other goods, wares, and merchandizes, the said defendants undertook and promised the said plaintiffs to pay them so much money as they reasonably deserved to have therefor, of the said defendants, when the said defendants should be thereunto afterwards requested; and the said plaintiffs aver, that they therefor reasonably deserved to have of the said defendants another sum of fifty thousand dollars, like money, whereof the said defendants, to wit, on the same day and year aforesaid, at the county aforesaid, had notice.

And whereas the said defendants afterwards, to wit, on the same day and year aforesaid, at the county aforesaid, were indebted unto the said plaintiffs in another sum of fifty thousand dollars, current money, for the work and labor, care and diligence of the said plaintiffs, before that time done, performed, and bestowed, and materials found by the said plaintiffs, for, in, and about the business of the said defendants, and for their and at their special instance and request; and being so indebted, the said defendants, in consideration thereof afterwards, to wit, on the same day and year aforesaid, at the county aforesaid, undertook, and then and there faithfully promised the said plaintiffs to pay them the said last mentioned sum of money when they should be thereto afterwards requested.

And whereas the said defendants afterwards, that is to say, on the day and year aforesaid, at the county aforesaid, in consideration that the said plaintiffs, at the like special instance and request of the said defendants, had before that time done, performed, and bestowed sundry other work and labour, care and diligence, in and about the business of the said defendants, and had found other materials therefor, at the instance and request of the said defendants, the said defendants undertook, and then and there faith-

fully promised the said plaintiffs to pay them so much money as they therefor reasonably deserved to have, when the said defendants should be thereto afterwards requested; and the said plaintiffs aver, that they therefor reasonably deserved to have of the said defendants another sum of fifty thousand dollars, current money, at the county aforesaid, whereof the said defendants afterwards, to wit, on the same day and year aforesaid, at the county aforesaid, had notice.

And whereas the said defendants afterwards, to wit, on the same day and year aforesaid, at the county aforesaid, was indebted to the said plaintiffs in another sum of fifty thousand dollars, like money, for the like sum of money by the said plaintiffs, and for the use of the said defendants, before that time paid, laid out, and expended at the special instance and request of the said defendants, at their special instance and request, and for other money by the said defendants before that time had and received, to the use of the said plaintiffs; and being so indebted, the said defendants, in consideration thereof, afterwards, to wit, on the same day and year aforesaid, at the county aforesaid, undertook and promised the said plaintiffs to pay them the last mentioned sum of money when they should be thereunto required.

And whereas the said defendants afterwards, to wit, on the same day and year aforesaid, at the county aforesaid, accounted together with the said plaintiffs of and concerning divers other sums of money, before that time due and owing from the said defendants to the said plaintiffs, and then being in arrear and unpaid, and upon that account the said defendants then and there found in arrear and indebted to the said plaintiffs in a large sum of money, to wit, in the further sum of fifty thousand dollars, like money; and so being found in arrear and indebted to the said plaintiffs, the said defendants, in consideration thereof afterwards, to wit, on the day and year aforesaid, at the county aforesaid, undertook and promised the said plaintiffs to pay them the last mentioned sum of money, when they should be thereunto afterwards required.

And whereas, afterwards, to wit, on the same day and year aforesaid, at the county aforesaid, the said defendants were indebted to the said plaintiffs in another sum of fifty thousand dollars, current money, for the work and labor, care and diligence of the said plaintiffs, by them the said plaintiffs and their servants, and with their horses, carts, and carriages, before that time done, performed, and bestowed, in and about the business of the said defendants, and for the said defendants, and at their special instance and request; and being so indebted, they, the said defendants, in consideration thereof, afterwards, to wit, on the day and year aforesaid, at the county aforesaid, undertook and promised the said plaintiffs to pay them the said sum of money, when they should be thereto afterwards requested.

And whereas the said defendants afterwards, that is to say, on the day and year aforesaid, at the county aforesaid, in consideration that the said plaintiffs, at the like special instance and request of the said defendants, had before that time done, performed, and bestowed, other their work and labor, care and diligence, by them the said plaintiffs, and other their servants, horses, carts, and carriages, in and about the business of the said defendants, they, the said defendants, undertook and promised the plaintiffs to pay them so much money as they reasonably deserved to have for the same, when they should be thereto afterwards requested; and the said plaintiffs aver, that they reasonably deserved to have of the said defendants, for

the said work, labor, care, and diligence, and for the said servants, horses, carts, and carriages, other sum of fifty thousand dollars, current money, whereof the said defendants afterwards, to wit, that is to say, on the day and year aforesaid, at the county aforesaid, had notice.

Yet the said defendants, not regarding their said several promises and undertakings so by them made in this behalf as aforesaid, but contriving and fraudulently intending craftily to deceive and defraud the said plaintiffs in this respect, have not yet paid the said several sums of money or any part thereof to the said plaintiffs, (although so to do the said defendants were requested by the said plaintiffs, to wit, on the same day and year aforesaid, and often afterwards, to wit, at the county aforesaid) but to do this the said defendants hitherto refused and still do refuse; wherefore the said plaintiffs say they are injured, and have sustained damage to the value of one hundred thousand dollars, current money; and therefore they bring suit, &c.

B. S. FORREST, *for the plaintiffs.*

And thereupon the said Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, by their attorneys aforesaid, pray that the said Chesapeake and Ohio Canal Company may answer to the declaration of them, the said Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, in the plea aforesaid.

Rule plea.

Whereupon it is ruled by the court here, that the said Chesapeake and Ohio Canal Company answer to the declaration of them, the said Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, in the plea aforesaid; and if the said Chesapeake and Ohio Canal Company do not answer to the declaration of the said Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, in the plea aforesaid, judgment will be rendered against them by default; and the said Chesapeake and Ohio Canal Company file in court here the following suggestion and affidavit, to wit:

DISTRICT OF COLUMBIA, *county of Washington, to wit:*

On this third day of March, in the year of our Lord one thousand eight hundred and thirty-two, before the subscriber, a justice of the peace in and for the said county, personally appears Charles Fenton Mercer, the president of and a stockholder in the Chesapeake and Ohio Canal Company, and makes oath on the Holy Evangely of Almighty God, that he very *belies* that a fair and impartial trial of the action on the case, wherein Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman are plaintiffs, and the Chesapeake and Ohio Canal Company are defendants, now depending in county court of Montgomery county, in the State of Maryland, cannot be had in said county court.

Sworn to before
ROBERT CLARKE,
Justice of the Peace.

DISTRICT OF COLUMBIA, *Washington county, to wit:*

I, William Brent, clerk of the circuit court of the District of Columbia, for the county of Washington, hereby certify, that Robert Clarke, esq.,

before whom the above affidavit appears to have been made, and who has thereto subscribed his name, was at the time thereof and still is a justice of the peace, in and for the county and district aforesaid, duly commissioned and sworn.

In testimony whereof, I hereto subscribe my name and affix the [SEAL.] seal of the said circuit court at the city of Washington, this third day of March, A. D. 1832.

WM. BRENT, *Clerk.*

Rule plea.

And thereupon, on motion of the said plaintiffs by their attorney aforesaid, it is ruled by the court here that the said defendants' answer to the declaration aforesaid, of the said plaintiffs in the plea aforesaid, or judgment by the court here will be rendered against him in default thereof.

Rule. Bill of Particulars of Demand.

And thereupon, on motion of the said defendants by their attorney aforesaid, it is ruled by the court here that the said plaintiffs file in this cause a bill of particulars of their demand.

The Chesapeake and Ohio Canal Company,

To Knapp, Ford, Acker, and Chapman, Dr.

To the construction of lock No. 5, of 8 feet lift, each foot lift at $1,500 - - - - -		$12,000 00
1,200 yards earth excavation in pit, at 17 cents, -	$204 00	
470 do. hard pan do. 35 cents, -	164 50	
120 do. quarried rock do. 50 cents, -	60 00	
230 do. blasted do. do. $1 25, -	287 50	
1,270 do. embankment in lock No. 5, 25 cents, -	315 00	
478 do. puddling do. 30 cents, -	143 40	
removing earth excavation into embankment, -	50 00	
water bailing - - - - -	208 00	
		1,432 40
the construction of lock, No. 6, of 8 feet lift, each foot lift at $1,500 - - - -		12,000 00
620 yards earth excavation in pit, at 17 cents, -	105 40	
730 do. rock do. blasted, $1 12½ -	821 25	
1,302 do. embankment in lock No. 6, 25 cents, -	325 50	
478 do. puddling 30 cents, -	143 40	
removing earth excavation into embankment, -	50 00	
water bailing - - - - -	76 00	
		1,521 55
detention and damage sustained for want of cement in locks Nos. 5 and 6 - - - -		600 00
the construction of lock No. 8, of 8 feet lift, each foot lift at $1,500, - - - -		12,000 00
1,612 yards earth excavation, at 17 cents, -	274 04	
1,344 do. embankment in lock No. 8, 30 cents, -	403 20	
puddling lock No. 8 with earth brought a great distance, - - - - -	150 00	
removing earth excavation into embankment, -	100 00	
excavation of ditch to drain pit, - - -	90 00	
		936 24

To the construction of lock No. 15, of 8 feet lift, each foot lift at $1,500 - - - -			$12,000 00
217 yards earth excavation in pit, at 17 cents, -		36 89	
857 do. rock do. blasted, $1 12½ -		964 13	
208 per's of wall from excavation of pit at 60 cts.		164 80	
193 perches of wall, not from do. at $1 25 -		241 25	
2,920 yds. embankment, lock No. 15, at 40 cents,		1,171 60	
188 days water bailing, - $1 00 -		188 00	
puddling lock and wing embankment to same, earth drawn a great distance, great expense in making road to get the earth - - -		450 00	
			3,216 67
the construction of lock No. 16, of 8 feet lift, each foot lift, at $1,500 - - - - -			12,000 00
522 yards earth excavation in pit, at 25 cents, -		130 50	
346 do. loose rock, do. 50 cents, -		173 00	
508 do. blasted do. do $1 25 -		635 00	
130 perches wall from pit excavation, 60 cents, -		78 00	
180 do. not from do. $1 25 -		228 75	
1,905 do. embankment, 35 cents, -		666 75	
removing earth excavation into embankment, -		30 00	
puddling lock and wing embankment to the same, earth brought a great distance, great expense in making road to get good earth from the mountain, - - - - -		475 00	
178 days water bailing, at $1 00 -		178 00	
			2,595 00
the construction of lock No. 17, of 8 feet lift, each foot lift at $1,500 - - - -			12,000 00
926 yds. blasted rock excavation of pit, at $1 00 -		926 00	
437 perches wall from excavation of pit 60 -		262 20	
1,092 do. do. not from do. 1 25 -		1,365 00	
933 yards embankment, 35 -		326 55	
puddling lock No. 17, - - - -		50 00	
			2,929 75
the construction of lock No. 18, of 8 feet lift, each foot lift at $1,500 - - - -			12,000 00
130 yds. loose rock excavation in pit, at 40 cts. -		52 00	
688 do. blasted do. $1 25 -		860 00	
1,432 do. embankment, do. 30 cts. -		429 60	
puddling lock No. 18, earth brought a great distance to obtain good quality - -		150 00	
87½ days water bailing, at $1 00 -		87 50	
			1,579 10
construction of lock No. 20, of 8 feet lift, each foot lift at $1,500 - - - -			12,000 00
130 yds. hard pan excavation in pit, at 30 cents, -		39 00	
135 do. earth do. 20 cents, -		27 00	
136 do. blasted rock do. $1 37½ -		764 50	
2,371 do. embankment, 25 cents, -		592 75	
753 days water bailing, $1 00 -		53 00	
puddling lock No. - - - -		125 00	
			1,600 25

To detention for want of cement at proper times at locks Nos. 8, 15, 16, 17, 18, and 20, damages sustained in consequence of such detention, -	$6,000 00
damage in urging the completion of the work by 4th of July, wages of men and teams greatly increased - - - - - -	1,850 00
difference in quantity of cement, represented by Mr. Ingle to have been used on locks Nos. 5, 6, 8, 15, 16, 17, 18, and 20, if correct, will amount to over and above the estimate of the engineers, previous to the letting of the work, or at that time, the cement also bad, and condemned by the engineers, - - - - - -	6,400 00
carting cement from river landings to the locks, -	1,800 00
boating and carting cement from Georgetown to do.	550 00
boating cement from Tuscarora for Canal company	1,600 00
boating do. from Sewall's at the Great Falls, -	200 00
painting 8 sets lock gates, at $35 00 each, -	280 00
extra work on lock foundations Nos. 5, 15, 16, 17, 18, it having always been said, previous to the letting of the work, that the foundations were good rock bottoms, and would incur little or no expense, - - - - -	4,000 00
645 feet face stone in each lock more than was originally represented at the time of the letting of the work, incurring an extra expense of transportation, - - - - - -	2,064 00
transportation of the above stone amounting in 8 locks to 544 tons, at $3 25 per ton, -	1,770 00
damages sustained by alterations and changes of lock culverts, as ordered by the chief engineer; two changes in the stone, which resulted in great waste and loss of stone, also the serious expense of quarrying and carting more stone for the culverts, - - - - -	1,200 00
damage done by the superintendent of stone and mason work at Seneca in June, 1829, by hammering and picking, and defacing cut stone prepared for use in the locks, - - -	250 00
building waste river at Bear island, near sections 16 and 17, - - - - - -	1,500 00

Non assumpsit and issue joined. Venire facias, to March term, 1834.

Thereupon the said defendants, by their attorney aforesaid, defend the force and injury, when, and so forth, and saith, that they did not assume upon themselves, in manner and form as the aforesaid plaintiffs above against them hath complained, and of this they put themselves upon the country, and the said plaintiffs in like manner and so forth, therefore let a jury thereon appear before the court here, on the fourth Monday of March next, by whom &c., and who neither, &c., to recognise, &c., because as well, &c., and the same day is given to the same parties, then and there, &c.

And now at this day, to wit: the said fourth Monday of March, in the

year of Our Lord one thousand eight hundred and thirty-four, comes again into the circuit court here, as will the said plaintiffs by their attorney aforesaid, as the said defendants by their attorney aforesaid; thereupon the said plaintiffs by their attorney aforesaid, file in court here the following depositions and other papers, to wit:

ABRAHAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN,
vs.
THE CHESAPEAKE and OHIO CANAL COMPANY.

Action in the Circuit Court of the District of Columbia for the county of Washington.

Interrogatories to be put to Theophilus Williams, on the part of Abraham Knapp, Benjamin Ford, Henry Acker and Fredus Chapman, in the above entitled action.

Interrogatory 1st. Do you know the several parties plaintiffs and defendants above named, and are you in any wise interested in the above suit or action, or in the event thereof?

Interrogatory 2d. Did or did not Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, above name plaintiffs at any, and at what time construct any lock or locks for the above named defendants; if yea, how many? Was you in the employment of said defendants; if yea, in what character or capacity?

Interrogatory 3d. Was there or was there not, any estimate of the quantity and price or costs of the materials to be used in the construction of each of the said locks, made by any person or board of engineers at the instance or procurement of the defendants? if yea, state the substance of such estimates, to whom they were delivered, and all your knowledge in relation thereto?

Interrrogatory 4th. Was or was not such estimates exhibited to, or made known to the persons making proposals for building the locks, and particularly to the above named plaintiffs; if yea, for what purpose was such estimate made?

Interrogatory 5th. What were the locations or sites of the locks built by the above named plaintiffs, and what were their foundations or bottoms, did they differ from the estimates; if yea, how did they differ, and was such alteration by order of the board of directors, or the engineers of the defendants; state your knowledge thereto, and of the favorableness or unfavorableness of the same?

Interrogatory 6th. What was the actual value or cost of the materials used in the construction of lock number 5, with its foundation? State particularly the kind and quantity used, with the cost of each, and of the labor in and about the execution thereof?

Interrogatory 7th. What was the actual cost or value of the materials used in the construction of lock number 6, with its foundation? State particularly the kind and quantity used, with the cost of each, and of the labor in and about the execution thereof?

Interrogatory 8th. What was the actual value or cost of the materials used in the construction of lock number 8, with its foundation? State particulaly the kind and quantity used, with the cost of each, and of the labor in and about the execution thereof?

Interrogatory 9th. What was the actual value or cost of the materials in and about the execution thereof?

Interrogatory 9th. What was the actual value or cost of the materials used in the construction of lock number 15, with its foundation? State particularly the kind and quantity used, with the cost of each, and of the labor in and about the execution thereof?

Interrogatory 10th. What was the actual value or cost of the materials used in the construction of lock number 16, with its foundation? State particularly the kind and quantity used, with the cost of each, and of the labor in and about the erection thereof?

Interrogatory 11th. What was the actual value or cost of the materials used in the construction of lock number 17, with its foundation? State particularly the kind and quantity used, with the cost of each, and of the labor in and about the erection thereof?

Interrogatory 12th. What was the actual cost or value of the materials used in the construction of lock number 18, with its foundation? State particularly the kind and quantity used, with the cost of each, and of the labor in and about the erection thereof?

Interrogatory 13th. What was the actual cost or value of the materials used in the erection of lock number 20, with its foundation? State particularly the kind and quantity used, with the cost of each, and of the labor in and about the erection thereof?

Interrogatory 14th. Did or did not the plaintiffs build any road or roads in and about the construction of the said locks? If yea, for what purpose were they erected, by whose order and direction, and what was the cost thereof, state your knowledge of the same?

Interrogatory 15th. Was or was not any flume or flumes made in either, and which of the said locks? If yea; what was the cost of them.

Interrogatory 16th. Was or was not protection or wing walls erected by the plaintiffs at any, and which of the said locks? If yea; what is the extent and value of such walls, and of puddling the same?

Interrogatory 17th. Did or did not the estimates furnished by the defendants, specify any number of bushels of cement necessary for the construction of a lock? If yea; state the number, the price to be paid for the same, how and where it was to be delivered, and by whom?

Interrogatory 18th. What was the quality of the cement furnished by the defendants for the construction of the said locks, and was it such as was contemplated by the estimates?

Interrogatory 19th. Did the plaintiffs suffer any inconvenience and were they subjected to any loss from the manner in which the cement was delivered to them? If yea; what is the amount of such loss and, how did it arise?

Interrogatory 20th. Were any, and what orders, given to the plaintiffs in relation to the completion of the locks by the 4th day of July, 1830. By whom were such orders given, and what was the effect upon the arrangements of the plaintiffs; and how was it incurred, and what was the amount thereof?

Interrogatory 21st. Is or is not water bailing upon canal work, a separate and distinct business from other parts of the work? What allowance should be made for it, and by whom estimated or valued?

Interrogatory 22d. Were any, and what alterations made in the form of the said locks during the progress of the work? In what stage of the work were such alterations made, and by whom were the costs of such alterations to be borne?

Interrogatory 23d. In what manner did the plaintiffs conduct the business or work whilst engaged in the construction of the said locks, and what was the character of the workmanship upon the locks referred to?

Interrogatory 24th. Was there any and what difference between the estimate of the board of engineers, exhibited to the plaintiffs, and the actual cost of constructing these locks; what was the cause of that difference, and what representations were made by the defendants as to the price of labor and subsistence, and what was the actual cost thereof?

Interrogatory 25th. Did or did not the quantity of cut stone required in the construction of said locks, exceed the estimate of the defendants' engineers? If yea; how much was such excess, and at what rate should it be valued or estimated in reference to the locks built by the plaintiffs?

Interrogatory 26th. Did or did not the quality of the cement, furnished by the defendants, require the use of a greater or less quantity than was estimated by the engineers, and how much did it differ from such estimates?

Interrogatory 27th. To whom should be charged the expense of draining, hauling, and putting into the locks the excess in the quantity of the cement used in constructing the said locks, over and above the estimates of the engineers; and at what rate should it be valued or estimated?

Interrogatory 28th. Did or did not the plaintiffs paint the gates of the locks above referred to? and what was the cost or value thereof?

Interrogatory 29th. Were the foundations or bottoms of any, and which of the locks built by the plaintiffs more or less expensive than was contemplated in the estimate of the engineers? State particularly your knowledge relative to the estimated cost of each of the said foundations, as well as the actual cost thereof?

Interrogatory 30th. Did or did it not become necessary to cut ditches to drain any and which of the pits for said locks? If yea; is this considered as extra work among canal contractors; and what is the cost or value of such labor performed by the plaintiffs?

Interrogatory 31st. Was any waste river or waste rivers erected by the plaintiffs? If yea; what is the location? how and what is their value or cost?

Interrogatory 32d. Were or were not the plaintiffs delayed or hindered in their work upon the said locks by the want of cement? If yea; what length of time were they so hindered or delayed, and what damage did they sustainby reason thereof? State all your knowledge.

Interrogatory 33d. Were the plaintiffs obstructed or delayed in the prosecution of their work upon the said locks by the premature letting and commencement of the work on the sections connected therewith, and by the laborers employed on said sections? If yea; what damage did the plaintiffs sustain by reason thereof?

Interrogatory 34th. Were there any, and, if any, what quantity of stone cut by the plaintiffs for the construction of said locks, rendered useless by alterations or changes made by the defendants in said locks, and what damage did the plaintiffs sustain thereby?

Interrogatory 35th. Is it or is it not usual or customary upon canals to charge contractors for building locks with quarry rent? State your knowledge.

Interrogatory 36th. Were the locks, waste rivers, embankments, and other works, mentioned in the foregoing interrogatories, fully completed by the plaintiffs, and approved and accepted by the said defendants or their engineers or agents? If yea, state the whole of your knowledge relating thereto.

Interrogatory 37th. Were or were not the plaintiffs directed by thed efendants not to construct the flooms mentioned in answer to the thirty-sixth interrogatory hereunto annexed; and did not or did not the plaintiffs give notice to the defendants of their readiness to construct the said flooms? State the whole of your knowledge relating thereto.

Interrogatory 38th. From your knowledge of the manner in which the plaintiffs conducted their operations upon said locks, and of the peculiar situation and circumstances connected with them, could these locks have been constructed for less than was done by the plaintiffs?

Interrogatory 39th. Do you know or are you informed of any thing further which is material to the plaintiffs or the defendants in the above action? Declare the whole truth.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, AND FREDUS CHAPMAN, *vs.* THE CHESAPEAKE AND OHIO CANAL COMPANY. } *Action in the Circuit Court of the District of Columbia, for the county of Washington.*

STATE OF NEW YORK, *county of Oneida, ss.*

The answers of Theophilus Williams, of the town of Lee, in the county of Oneida, and State of New York, to the several interrogatories hereunto annexed, taken on oath before Arnon Comstock, esq., one of the judges of the court of common pleas of the said county of Oneida, at his office in the town of Rome, in the said county of Oneida, on the eleventh day of October, in the year of our Lord one thousand eight hundred and thirty-three.

To the first of the foregoing interrogatories this deponent, answering, says, that I was acquainted with Abram Knapp, and more particularly with Benjamin Ford and Fredus Chapman, during the time they were engaged as contractors on the Chesapeake and Ohio canal; also that I was acquainted with the directors of the Chesapeake and Ohio canal company, and that I am in no way or manner interested in the suit between Knapp, Ford, Acker, and Chapman and the Chesapeake and Ohio canal company, or in the result thereof.

To the *second* interrogatory this deponent says, that Knapp, Ford, and Chapman, the above named plaintiffs, in the years 1829 and 1830 did construct eight locks on the said company's canal, viz. locks Nos. 5, 6, 8, 15, 16, 17, 18, and 20, on the eastern section of the said canal; and that this deponent was employed by the said defendants in the capacity of assistant engineer, of the second rendezvous; and that all the above mentioned locks, except the two first, were constructed under the superintendence of this deponent.

To the *third* interrogatory this deponent replies, that an estimate of the quantities of materials required for the construction of a lock of the dimensions of those built on the Chesapeake and Ohio canal, was delivered by Nathan S. Roberts, esq., a member of the board of engineers to the engineers of the rendezvous to which this deponent was attached; which estimate of quantities was designed to govern in the making out of the monthly estimates for the contractors.

Response 4th.—To the fourth interrogatory this deponent answers, I have no knowledge of the object of these estimates, beyond what is contained in my answer to the third interrogatory.

Response 5th.—To the fifth interrogatory this deponent says, that locks Nos. 5 and 6, not being constructed under my superintendence, this deponent cannot state with the same certainty what their foundations were; that lock No. 8 was on a foundation of timber, that all the rest, viz. locks Nos. 15, 16, 17, 18 and 20, were founded on uneven rocky surfaces, all (except the last) requiring a large quantity of masonry, to bring them up to the height at which the walls of lock built on a foundation of timber begin; that this deponent knows of no estimate of quantities made out by the board of engineers, or any engineer in the service of the Chesapeake and Ohio Canal Company, in which the walls were not considered as being built on a wooden foundation, or on a foundation of smooth rock. The sites of all the locks were selected by the engineers of the said company, and this deponent never heard any objection made to their several locations by the directors, or any other officer, of the said company. A change was made on the site of lock No. 17, by which it became necessary to excavate a large quantity of rock, and thereby greatly increased the expense of the foundation. The difficulty of preparing the foundation for locks Nos. 15, 16, 17 and 18, in consequence of the broken, rocky surfaces, on which they were built, were such that this deponent believes the expense of masonry below the usual foundation, and the filling up and securing chasms and fisures in the rocks, to make the lock bottoms water-tight, cost, on the last four mentioned locks, nearly double what the expense of wooden foundations, in ordinary circumstances, would have been.

Response 6th.—This deponent replies to the *sixth* annexed interrogatory, that the free stone used in constructing lock No. 5, was principally brought from Aquia creek, the transportation of which greatly increased the expense of constructing the lock; and in this deponent's opinion, the cost of constructing lock No. 5, without including any part of the expense of preparing the foundation, could not have been but little short of thirteen hundred dollars per foot lift. Lock No. 5, not being constructed under his superintendence, this deponent cannot state, with exactness, what the expense of digging the lock-pit, embankment, and puddling, water bailing, and the preparing the foundation was; but this deponent does know that the foundation was very expensive, and that, in consequence of its low situation, a great deal of bailing was required to keep the lock-pit clear of water, while the foundation was being prepared and laid.

Response 7th.—To the *seventh* annexed interrogatory this deponent answers, the same as to the last, or sixth interrogatory, except that in this deponent's opinion, the expense of the foundation of lock No. 6, was considerably less than that of lock No. 5.

Response 8th.—This deponent answers to the *eighth* annexed interrogatory, that from a calculation made by him, in which the materials used, and labor incurred, in constructing lock No. 8, were put at what this deponent considers their fair value; this lock, including the foundation, appears to have cost fourteen hundred and fifty-two dollars per foot lift. In this calculation, the excavation and draining of the pit, and the embanking and puddling around the lock, is not included. The excavation of the pit was earth, and was worth, in the opinion of this deponent, twenty-five cents per cubic yard. About half the quantity of this excavation was required to be moved a second time in landing up, or embanking of the lock, and was worth 12½ cents per yard for so removing. The remaining part of the embankment was obtained at a considerable distance, and under very unfa-

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vorable circumstances, and was worth, in this deponent's opinion, thirty cents per cubic yard, and for the labor of puddling, say one hundred and fifty dollars for the lock and guard bank.

Response 9th.—To the *ninth* annexed interrogatory this deponent answers and says, that the site of lock No. 15 was of very different access, and that obstacles of the most formidable nature were to be overcome in transporting the materials used in its construction to the site of the lock, thereby causing great labor and expense. That the lock was built on a rock foundation, a part of which was a good deal lower than was necessary for the bottom of the lock, and where the work was so below the necessary height of the foundation, it required filling up with masonry, thereby increasing the whole quantity of masonry, as this deponent believes, to the amount of two hundred and forty-five perches; the masonry of this lock was laid in mortar instead of grout. From the best estimate this deponent can make of the actual cost of constructing lock No. 15, it cost, including the extra quantity of masonry, which filled up the inequalities of the rock bottom as before stated, fifteen hundred and thirty-eight dollars per foot lift, or excluding this masonry, below the usual foundation, fourteen hundred dollars per foot lift. In the foregoing estimate, the excavating of the lock-pit, the bailing of water from it, and the embanking and puddling of the lock and guard bank, are not included. This deponent believes that in excavating the pit, the rock blasted was worth a dollar and a quarter a cubic yard, and all other excavation about the lock, thirty cents. The embankment for the lock was obtained at great trouble and expense, and was worth, in the opinion of this deponent, forty cents per cubic yard. The puddling around the lock and in the guard bank, this deponent thinks, was worth not less than two hundred dollars. In founding the walls, a considerable amount of bailing water was done. This deponent took no minutes of the time so spent, and cannot state the amount.

Response 10th.—To the *tenth* annexed interrogatory this deponent replies, that there was the same difficulty of access to lock No. 16 as to lock No. 15, and the same obstacles to be overcome; the materials being landed at the same place from the Potomac river, and having to be transported over the same road, and that the foundation was of the same character as that of lock No. 15, described in the answer to the ninth interrogatory, and this deponent believes that the cost of constructing lock no. 16 was, exclusive of the extra quantity of masonry laid below the usual foundation of the lock, not less than fourteen hundred dollars per foot lift, as in lock No. 15; and, from minutes made on the Chesapeake and Ohio canal, this deponent believes this extra quantity of masonry laid below the cut stone and below the usual foundation of the lock, was one hundred and sixty-four perches of masonry, laid in cement, and one hundred and eighty-five perches of dry wall. The laying of the 164 perches of cemented masonry, including the stone and cement, this deponent thinks worth four dollars and fifty cents per perch, and the dry wall, say two dollars per perch; the earth excavation in the lock-pit, this deponent considers worth twenty-five cents per cubic yard; the excavation of loose, or quarried rock, fifty cents per yard; and the rock excavation, which required blasting, one dollar and twenty-five cents per cubic yard; the embankment around the lock and in the guard bank, was worth from thirty-five to forty cents per cubic yard; puddling, say two hundred dollars. A good deal of bailing was done in founding the lock; this deponent cannot state actually how much.

Response 11th.—To the *eleventh* interrogatory hereunto annexed, this deponent answers, that lock No. 17 was built on a crag of rock, in an ancient channel of the Potomac river, altogether inaccessible to teams of any kind, until a road was formed on the towing path of the canal, which was being constructed during the time when the materials for constructing the lock were obliged to be hauled over it. The rock on which the lock was built, being too small to allow room for a stone yard, the face stone were required to be hauled to the lock, as they were wanted for immediate use; so that the men and teams employed in transporting materials to the lock, encountered continual hindrance and delay from the carts and teams employed in embanking the canal, being unavoidably in the way, and the plaintiffs suffered serious loss from this cut stone being broken and defaced, by coming in contact with carts, &c. employed on the canal section immediately adjoining the lock. From what this deponent saw of these hindrances, and the unavoidable difficulties surmounted by these plaintiffs during the construction of this lock, (and he was seldom absent from it a day during the whole time) this deponent is fully convinced that the cost of constructing lock No. 17, exclusive of the extra quantity of masonry by leveling up the irregularities of the rock on which it was founded, the excavating of the pit or foundation, and the embanking and puddling protection walls, could not have been less than fifteen hundred dollars per foot lift. The quantity of masonry laid in cement below the cut stone and the usual foundation of the lock, this deponent believes, from minutes in his possession, to have been one hundred and sixty-nine perches; worth, including cement, four dollars and fifty cents per perch. The rock was split across the chamber of the lock and under the walls, by several narrow vertical chasms, which required to be filled up with stone and grout, in order to make the lock water-tight; the expense of securing these chasms, in labor and cement, was about thirty dollars. The excavation for the foundation was all solid rock, and was worth one dollar a yard; the embanking was worth thirty-five cents per cubic yard. A part only of the puddling of this lock was done by the plaintiffs; this deponent cannot state the quantity with exactness; thinks the part done by them may have been worth fifty dollars.

Response 12th.—To the *twelth* interrogatory this deponent says, that lock No. 18, though less difficult of access than lock No. 17, was distant more than a mile from the spot at which the materials were necessarily landed, and subjected, in a considerable degree, to the same hindrances and injury to the cut stone, as already stated to have suffered by the plaintiffs in constructing lock No. 17; and it is the opinion of this deponent, that without including the excavating of the lock-pit, leveling up with masonry under the foundation, embanking, puddling, or water bailing, the cost of constructing lock No. 18, was not less than fourteen hundred and fifty dollars the foot lift. The rock blasting in the lock-pit, this deponent considers worth one dollar and twenty-five cents per cubic yard; and embankment, from twenty-five to thirty cents. This deponent cannot state with accuracy the amount of water bailing, but knows that some considerable bailing was done. The puddling may have been worth one hundred and fifty dollars.

Response 13th.—To the *thirteenth* annexed interrogatory, this deponent answers, that lock No. 20 was built under circumstances more favorable than locks No. 17 and 18, but, from the best calculation this deponent can make, it is my opinion that lock No. 20 actually cost more than fourteen hundred dollars per foot lift, inclusive of the excavating of the pit, or water bailing,

embanking, or puddling around the lock. The blasting in the pit, deponent thinks worth one dollar and thirty-seven and a half cents per cubic yard; and all the other excavation about the lock, worth twenty-five cents per cubic yard; and the embanking of the lock, about twenty-five cents; some bailing was done, but this deponent cannot state how much. The puddling around the lock was probably worth about one hundred and fifty dollars.

Response 14th.—This deponent answers to the *fourteenth* annexed interrogatory, that roads were constructed by the plaintiffs from locks No. 15 and 16, on the northerly side of the canal, for the purpose of hauling embankment for the locks named. The roads were made by the direction of the resident engineer, because no earth of a proper *quantity* for puddling around the locks, and for the guard banks, could be obtained elsewhere than at the place to which these roads led. The ground on which they were built was extremely unfavorable for roads, some considerable rock was blasted of them; this deponent thinks these roads might have been worth two hundred dollars to each lock.

Response 15th.—To the *fifteenth* interrogatory this deponent says, that flooms were constructed around some of them, and perhaps all, but they were constructed under the direction of the superintendent of the canal, and this deponent cannot say what they cost.

Response 16th.—To the *sixteenth* annexed interrogatory, this deponent answers, walls were built by the plaintiffs at locks No. 15, 16 and 17; from a copy of estimates in my possession, it appears that two hundred and eight perches of vertical dry wall was built at lock No. 15, of stone furnished from the excavation of the lock-pit, worth, in the opinion of deponent, sixty-two and a half cents per perch, and one hundred and ninety-three perches of similar work of stone, furnished by the plaintiffs, worth, this deponent believes, one dollar and twenty-five cents per perch. At lock no. 16, the plaintiffs built three hundred and thirteen perches of dry (on trial) wall, of which, as appears by the copy before mentioned, one hundred and thirty perches were built of stone from the excavation of the lock-pit, and, in this deponent's opinion, was worth sixty-two and a half cents per cubic yard; and one hundred and eighty-three perches were built of stone quarried by the plaintiffs, and was worth one dollar and twenty-five cents per perch. By the before mentioned copy of estimates, it appears, that fifteen hundred and twenty-nine perches of (on trial) dry wall, built by the plaintiffs at lock No. 17, four hundred and thirty-seven of which, was built of stone from the excavation of the lock-pit, and ten hundred and ninety-two perches of stone quarried by the plaintiffs. That part built of stone furnished by the plaintiffs, this deponent considers worth one dollar and twenty-five cents per perch; and the remainder, worth sixty-two and a half cents per perch.

Response 17th.—This deponent replies to the *seventeenth* interrogatory annexed, that in the estimate referred to in his answer to the third annexed interrogatory, the quantity of cement required for a lock of eight feet lift was stated to be three thousand bushels, or two and a half bushels to each perch, of twenty-five cubic feet of masonry. This deponent remembers being told by the members of the board of engineers, while these locks were being built, that the cement was to be delivered to the contractors, by the defendants, for fifty cents per bushel.

Response 18th.—To the *eighteenth* annexed interrogatory this deponent says, that the cement furnished by the defendants was in great part of a very inferior quality. That from Sheperdstown was the best, but this would not

usually bear more than one-third sand without injuring its adhesive qualities. The cement brought from Tuscarora was so meagre that not more than one-fourth sand could be added, and where it was used for setting freestone, or about the culverts or other exposed parts of the lock, no sand at all was added. The greater part of the cement used in constructing locks No. 8, 17, and 18 was of the latter kind. This deponent always understood that in making the estimates, that the New York cement was taken as the standard of quality, which would bear at least one-half sand.

Response 19th.—To the nineteenth interrogatory this deponent answers, that the plantiffs did suffer inconvenience by the cement being delivered at points on the river remote from the lock sites, by which the plantiffs were subjected to the expense and trouble of hauling it to the locks at which it was to be used. The cement for locks No. 15 and 16 was hauled on an average about half a mile, and the average distance which the cement, used in constructing locks No. 17, 18, and 20, was hauled, exceeded a mile; another inconvenience resulted from the irregularity of the supply—it, the cement, being sometimes delivered in quantities greater than the plaintiffs were prepared to receive; and at other times they were compelled to stop work for the want of it. The amount of loss sustained by the plaintiffs from this cause, seems to be the value of hauling the cement for locks No. 15, 16, 17, 18, and 20, or about twenty-five thousand bushels, or thereabouts, from the landing places on the river to lock sites, which, including the building of a cement house at the river, (where it would otherwise have been unnecessary,) and unloading it from the boats, would in the opinion of this deponent be worth seven cents per bushel, or the gross sum of seventeen hundred and fifty dollars.

Response 20th.—To the *twentieth* interrogatory annexed this deponent says, orders were given to the plaintiffs to complete their locks, so as to be ready to receive the water into the canal by the fourth day of July, 1830. This deponent received the order from his immediate superior, (the resident engineer,) and afterwards from the President of the Chesapeake and Ohio Canal Company, and was communicated by this deponent to the plaintiffs. The effect of this order to the plaintiffs was to greatly enhance the expense to them, by compelling them to increase the force in their employ; and in order to effect this increase of force, the plaintiffs were obliged to offer much higher wages than they were previously giving.

The employing of a greater number of men necessarily required the plaintiffs to procure more tools, and to provide accommodations for a greater number of men than would have been necessary had *had* a longer time been allowed; another disadvantage to the plaintiffs resulting from this increase of force was the placing of more men upon the same piece of work than could be employed to advantage, so that there was not the same amount of labor performed in proportion to the number of men employed, as could have been done by a less number. The deponent has no means of estimating accurately to what amount the expense to the plaintiffs was enhanced by their compliance with this order; but taking into account, the consequent increase of wages, and the cost of tools; and of accomodations; men more than was necessary; the expense arising from this cause, could have been little less than two thousand dollars.

Response 21st.—This deponent replies to the twenty-first interrogatory annexed, that unless it is expressly stipulated to the contrary by agreement,

water bailing is considered an extra charge, and is usually paid for at the estimate of the engineer, by the party for whom the work is done.

Response 22d.—To the *twenty-second* annexed interrogatory this deponent answers, that a material change was made in the dimensions of the culverts of the locks, by which a number of large blocks of stone which were cut so that one side was to form the face of the lock wall, and the opposite side, will form that of the culvert, and the top of the same block to be level with the top for covering of the culvert. By enlarging the culverts, the blocks of stone were rendered useless for the purpose for which they were at first intended, and were used as common ashlar. The quarrying and cutting of these stones are worth perhaps twice as much by the foot as common ashlar, on account of their having to be of certain prescribed dimensions, with all their faces square, smooth, and regular. Permission was then given to the engineer-in-chief to the plaintiffs in the presence of this deponent to cut flags of stone of ten or twelve inches in thickness, and of a breadth equal to the hieght of the culverts. These flags were to form the inside of the culverts, and the wall or the face of the lock to be built of common ashlar, hammered so as to fit close to the rear of the flags forming the adjoining face of the culvert. These flags were prepared, and a considerable part of them delivered at the locks, but were prevented from being used by the order of the Chesapeake and Ohio Canal Company, and other stones were required to be cut to replace them. The breast walls of the locks were, according to this deponent's recollection, originally intended to be six feet in thickness, but the plan was subsequently altered, and the said breast walls were built eight feet thick, making abont seven purches more masonry. The return or wing walls were originally calculated (according to deponent's recollection) to be four feet thick, but were built six feet thick, making about thirty one additional perches of masonry, the paddle gates of the locks were originally expected to be made of wood secured by proper irons, and cast iron ones were afterwards required by the defendants. The difference between the cost of wooden and cast iron paddle gates would depend in a great degree on the manner in which the wooden ones were made, and the quantity of iron work about them, but this deponent thinks good substantial wooden paddle gates might have been made for twenty-five dollars less, on each lock, than the cost of the cast iron ones.

Response 23d.—To the *twenty-third* interrogatory this deponent answers: that he believes the work to have been constructed by the plaintiffs, with industry, skill, and fidelity, and that they evinced a degree of energy and perseverance in overcoming the various formidable obstacles which they met with in prosecuting their work, which has rarely been equalled by contractors for public works. The workmanship this deponent believes to be substantial and workman-like.

Response 24th.—To the *twenty-fourth* interrogatory this deponent says: That he cannot state from his own knowledge what estimates were exhibited to the plaintiffs by the board of engineers. What this deponent believes to have been the actual cost of constructing the several locks built by the plaintiffs, has been already stated, in this deponent's answers to the sixth, seventh, eighth, ninth, tenth, eleventh, twelfth, and thirteenth of the annexed interrogatories. The difference between the actual and the estimated cost of constructing locks on the defendants' canal, is, in the opinion of this deponent, *is, in the opinion of this deponent*, to be principally attributed to a wrong impression which prevailed at the time the estimates were made, as

to the prices at which labor and provisions could be obtained; experience having since proved that the price of labor ranged from fifty to one hundred per cent above what it was then expected to cost, and the cost of subsistence was from fifteen to twenty-five per cent above what was anticipated. This deponent has no knowledge of what representations were made to the plaintiffs relative to the price of labor and subsistence, but this deponent *does* know, that the impression which generally prevailed as to the price of both, at the time when the plaintiffs took the job of building these locks, varied from the actual cost nearly in the ratio above stated.

Response 25th.—This deponent answers to the *twenty-fifth* interrogatory annexed, that the quantity of cut stone in the locks built by the plaintiffs, exceeded the quantity estimated by the board of engineers, six hundred and forty-five feet. The cutting of this excess may be worth twenty-five cents per foot.

Response 26th.—To the *twenty-sixth* annexed interrogatory this deponent says, that the quality of cement furnished by the defendants has been described in the answer to the eighteenth annexed interrogatory. This deponent believes that the excess in the quantity of cement used, over the quantity estimated by the board of engineers, was nearly all occasioned by the meager quality of the cement, and the increased quantity of masonry in some of the locks as before stated. The excess will, I presume, be correctly shown in the quantity of cement charged by the defendants to the plaintiffs over and above the quantity estimated by the board of engineers. This deponent thinks from recollection, that the excess averaged about two thousand bushels to a lock.

Response 27th.—To the *twenty-seventh* annexed interrogatory this deponent says: that in his opinion the expense of hauling the excess in quantity of cement over and above the quantity estimated by the board of engineers, should be charged to the defendants. The value of hauling the cement has been stated in the answer to the nineteenth interrogatory.

Response 28th.—To the *twenty-eighth* interrogatory this deponent answers, the plaintiff did paint the lock gates referred to; and this deponent considers the value of such painting to be about thirty-five dollars for each lock.

Response 29th.—To the *twenty-ninth* annexed interrogatory this deponent answers, that the foundations of locks No. 15, 16, 17, and 18, were more expensive than wooden foundations, and that of lock No. 20, equally as expensive if not more so. The labor and expense of levelling and smoothing the surface of a foundation blasted in rock, the strata of which approach so near a vertical position as the granite rock of Bear island, with the fitting down of the first course of face stone, and the timbering, planking, sheet-piling, and securing at the lower gates, will, as this deponent believes, be found quite equal to the expense of putting in a wooden foundation in ordinary cases, without including the extra quantity of masonry laid in some of the locks built by the plaintiffs below the cut stone. The value of this extra masonry has been stated for each lock, in the answers to preceding interrogatories.

Response 30th.—To the *thirtieth* interrogatory this deponent says, that drains were dug from several of the locks built by the plaintiffs, but this deponent believes that the quantity of excavation in them was added to, and estimated with the excavation of the lock pit from which the drains were respectively cut.

Response 31st.—To the *thirty-first* interrogatory annexed, this deponent says, a waste river was built by these plaintiffs at Bear island. This deponent knows of no other waste river or waste rivers built by them. The deponent can only state the cost of this waste river from recollection, but should think it might have cost about fifteen hundred dollars. After this waste river was completed and accepted, it was judged necessary to extend and strengthen the embankment, and the plaintiffs were requested to make the said embankment. The deponent thinks the embankment made by the plaintiffs at this time may have been worth from twenty-five to thirty dollars, and is not aware of its ever being included in any estimate of work done by them.

Response 32d.—To the *thirty-second* annexed interrogatory, this deponent replies, that the plaintiffs were very greatly hindered in their operations by the want of cement. This deponent has no written memoranda of the time which the plaintiffs were so hindered, but believes the time lost by the failure of the defendants to furnish cement, was not less than one third of the whole time from the first of April to the first of August 1830; and this deponent can further state that the opinion of the late resident engineer (Daniel Van Slyke, esq.) agreed with that of this deponent above stated, as to the proportion of the time lost by the plaintiffs for want of cement. Orders were given to the plaintiffs not to discharge their men when idle for want of cement, but to retain them all under pay until a supply could be procured. This order had not reference to any one particular time when the plaintiffs were hindered for want of cement. The deponent was directed by the resident engineer to communicate the order to the plaintiffs, and did accordingly communicate it to them. This was the usual course of transmitting orders to the contractors for the different works on the Chesapeake and Ohio canal. This deponent received the same order at several different times from the president of the company. It was reiterated to the plaintiffs at various times, and was, as this deponent believes, strictly complied with by them. This order as well as that referred to in the answer to the twentieth, was, according to this deponent's recollection, verbally given. This deponent cannot state with accuacy, to what extent the plaintiffs were delayed for want of cement previous to the first of April, but thinks there was some considerable for want of cement before that time. From what this deponent recollects of the number of men and teams employed by the plaintiffs, and the high wages paid to laborers generally, and more particularly to mechanics, and the expense of subsisting men and teams, this deponent is fully convinced that including the wages of laborers and mechanics, the subsistence of men and teams, and the wear and tear of tools, the expense of the plaintiffs must have averaged, while hindered for want of cement, from one hundred and fifty to one hundred and seventy-five dollars a day. The deponent cannot say with exactness what number of days the plaintiffs were compelled to suspend their operations for want of cement, but thinks the whole detention may have been equal to from thirty to forty entire days.

Response 33d.—To the *thirty-third* annexed interrogatory this deponent says, that the plaintiffs were obstructed and delayed in their work on locks No. 17; and the hindrance resulting from the men and teams employed on the locks coming in contact with them that were at work on the section of canal would have been avoided. The deponent cannot say any thing more

on this head than what is above stated; and in answer to the eleventh and twelfth interrogatories hereunto annexed.

Response 34th.—To the thirty-fourth interrogatory this deponent answers, that certain stones cut by the plaintiffs were rendered useless by alterations in the plan of the locks, made by the officers of the canal company, said stones have been described in the answer to the twenty-second annexed interrogatory. The deponent does not recollect, distinctly, the quantity of said stone, and cannot state the amount of damages which the plaintiffs sustained thereby.

Response 35th.—To the thirty-fifth interrogatory this deponent replies, That he has never known quarry rent charged to the contractors for locks an any other canal besides the Chesapeake and Ohio canal.

Response 36th.—To the *thirty-sixth* interrogatory this deponent answers, that to the best of his recollection locks built by the plaintiffs were completed, in all respects, to the acceptance of the engineer, except the flooms. The deponent recollects some small pieces of work done by the plaintiffs, at the suggestions of the engineer, as spikes, bolts, and clamps being put in after the locks were supposed to be finished.

Response 37th.—To the thirty-seventh interrogatory this deponent says, that he has no knowledge of the plaintiffs ever being directed by the defendants either to build or not to build the flooms. But the deponent remembers being notified by the plaintiffs as an engineer in the service of the defendants (before any flooms were built around the locks constructed by the plaintiffs) were ready to construct flooms around the locks built by them. This deponent stated the substance of this notice to the company's principal clerk, and does not, at this time, recollect any thing more respecting the flooms.

Response 38th.—To the thirty-eighth interrogatory this deponent answers, that the plaintiffs conducted their operations with as much judgment, skill, and prudence, as this deponent has ever seen evinced by any other contractors; and, in his opinion, the locks constructed by the plaintiffs could not, under existing circumstances, have been built at a less expense by any other persons, than they were built at by the said plaintiffs.

Response 39th.—To the thirty-ninth interrogatory this deponent says, that the preceding answers contain all the material parts relating to this controversy which are within the knowledge of this deponent. As frequent reference has been made, in the preceding answers, to the *foot lift* of the locks, it may not be improper to state that all the locks built by the plaintiffs were of eight feet lift. One disadvantage to the plaintiffs, resulting from the failure of the defendants to furnish the necessary supply of cement, not enumerated in the answers to the preceding interrogatories, was, that these delays protracted the completion of their work into the sickly months, much to the disadvantage of the plaintiffs, as they were compelled to pay very high wages to their hands to induce them to remain when it was considered dangerous.

THEOS. WILLIAMS.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN, *vs.* The CHESAPEAKE and OHIO CANAL COMPANY. } *Action in the circuit court of the District of Columbia, for the county of Washington.*

I, Aaron Comstock, one of the judges of the court of common pleas of

the county of Oneida, in the State of New York, not being counsel nor attorney for neither of the parties mentioned in the above cause, nor in any manner interested in the event of the said cause, do hereby certify, that, on the eleventh day of October, in the year of our Lord one thousand eight hundred and thirty-three, at my office, in the town of Rome, in the county of Oneida, and State of New York aforesaid, I caused to come before me, Theophilus Williams, of the town of Lee, in said county, a witness named and produced to me on the part of the plaintiffs above mentioned, and have taken his deposition upon interrogatories furnished by said plaintiffs, which said interrogatories, and the answers or depositions thereto, are hereto prefixed and enclosed; that the said deposition was reduced to writing by the said witness in my presence, and was subscribed by him in my presence after the same had been so reduced to writing. That, previous to the taking thereof, the said deponent was by me carefully examined, cautioned, and sworn, to testify the whole truth. That, at the time of taking the said depositions, the said Theophilus Williams, resident in the town of Lee, in the county of Oneida, in the State of New York aforesaid, more than one hundred miles from the city of Washington, the place of trial of the said cause; and this his so residing and being more than one hnndred miles from the said city of Washington, was the reason and cause of taking the said deposition. And that I have not given or served, nor caused to be given or served, any notice on the said defendants, or their attorney or counsel, of the taking of the said depositions, or to be present thereat and put interrogatories, if they should think fit, because neither the said defendants or their attorney, or counsel of theirs, to my knowledge, were within one hundred miles from the town of Rome, in the said county of Oneida, in the State of New York aforesaid.

In witness, whereof, I have enclosed the said depositions and interrogatories, and do hereby return the same, under my hand and seal, with the reasons of taking the same to the honorable the judges of the circuit court of the District of Columbia, for the county of Washington, this eleventh day of October, one thousand eight hundred and thirty-three.

[SEAL.] ARNON COMSTOCK.

One of the Judges of the Court of Common Pleas of the county of Oneda, in the State of New York.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN.
vs.
CHESAPEAKE and OHIO CANAL COMPANY.
} *Action in the Circuit Court of the District of Columbia for the County of Washington.*

Interrogatories to Henry A. Packard and John O. Stearns, on the part of Knapp, Ford, Acker, and Chapman, in the above action.

Interrogatory 1. Do you know the several parties above named, and are you interested in the above suit or action?

Interrogatory 2. Are you not mechanics, acquainted with stone work and masonry in building and constructing canal locks?

Interrogatory 3. Do you or not know that Knapp, Ford, Acker, and Chapman, built and constructed a number of locks on the Chesapeake and Ohio canal for the Chesapeake and Ohio Canal Company? and was or not, the number of locks eight? what was the actual cost per foot lift for constructing said locks? at what time were said locks built?

Interrogatory 4. Did you or not do and lay the mason work of one of said locks for the said Knapp, Ford, Acker, and Chapman, upon said Chesapeake and Ohio canal? what was the price per perch you received from said Knapp, Ford, Acker, and Chapman, for laying the mason work of said lock?

Interrogatory 5th. Do you or not know something of a conversation which passed between John P. Ingle, clerk of the Chesapeake and Ohio Canal Company, and Benjamin Ford and Fredus Chapman? and what was that conversation? and at what time or date did said conversation occur?

Response 6th. Did you or not meet with delay and hindrance sundry times whilst building the mason work of said lock? what was the cause of said delay or hindrance?

Response 7th. What was the quality of the cement used in the masonry of the locks built upon said canal by Knapp, Ford, Acker, and Chapman? what is the difference in the nature between the cement known as the New York cement, and that used in the works and locks constructed by Knapp, Ford, Acker, and Chapman, upon the Chesapeake and Ohio Canal?

Response 8th. Do you know any thing further material to plaintiffs or defendants in the above action? Declare the whole truth?

ABRAHAM KNAPP, BENJAMIN FORD, HENRY ACKER and FREDUS CHAPMAN.
vs.
CHESAPEAKE and OHIO CANAL COMPANY.

Action in the Circuit Court of the District of Columbia for the County of Washington.

John O. Stearns, a witness for the plaintiffs in the above action, being sworn, deposeth and saith in answer to the first interrogatory:

Response 1st. I am acquainted with the parties above named, and I am not interested in the above suit or action.

Response 2d. To the second Interrogatory.—I am a mechanic, I am acquainted with stone work and masonry, and in building and constructing canal locks.

Response 3d. To the third Interrogatory.—I do know that Knapp, Ford, Acker and Chapman, built and constructed a number of locks upon the Chesapeake and Ohio canal, for the Chesapeake and Ohio Canal Company, and that the number of locks constructed and built were eight. I think that fifteen hundred dollars would be the lowest possible average per foot lift. The greatest part of the work was done in the spring of the year one thousand eight hundred and thirty, and the whole completed in the same year.

Response 4th. To the fourth interrogatory.—Henry A. Packard and myself, built one of the said locks, viz. Lock No. 8, that is, we did the mason work for Knapp, Ford, Acker, and Chapman, upon said Chesapeake and Ohio canal, for which we received one dollar per perch.

Response 5th. To the fifth interrogatory.—I was present at a conversation which took place, between John P. Ingle, clerk of the Chesapeake and Ohio Canal Company, and Benjamin Ford and Fredus Chapman, in relation to a certain lot of lock-stone, quarried and cut by Joseph W. Maynard, upon the farm of Mrs. Broom, in Montgomery county, Maryland, in which conversation, I heard Ford ask Ingle, what was to be done with

those stone of Maynards, which had been attached by Broome; to which Ingle replied that the company, had been at Rockville, and found that their bill of sale for the stone of Maynard, had not been recorded and, consequently, was good for nothing, and Ingle, furthermore, told Ford, that the board of directors of the canal company had sat upon the business of the stone of Maynard, and had come to the conclusion, fully, that they (the canal company) could not hold the stone, as their title was not legal, and Ingle, further said to Ford, that the Board of Directors, had authorised him (Ingle) to inform Ford and Chapman, that, they must take their own course in relation to the purchase of the stone, and do the best they could; I think the conversation took place the last of March, or beginning of April, one thousand eight hundred and thirty.

Response 6th. To the sixth interrogatory.—We did meet with delay and hindrance at sundry times whilst building the mason work of said lock in consequence of a want of a sufficient supply of cement.

Response 7th. To the seventh interrogatory.—The quality of cement used in the masonry of the locks built upon said canal by Knapp, Ford, Acker, and Chapman, was not good; I should think that the cement used by them was at least one-third less in value to the New York cement.

Response 8th. To the eighth interrogatory.—We were ordered by Daniel Vanslyke, one of the engineers of the Chesapeake and Ohio canal company, to use more cement, on account of its being bad. With some of the cement, *to* told us to use four parts to one of sand, and some three parts to one, and some two to one, and there was some of it that he would not let us use at all, in consequence of its bad quality, and further this deponent saith not.

J. O. STEARNS.

I, John Swift, esq., mayor of the city of Philadelphia, and president judge of a court of record in said city, not being counsel or attorney for either of the parties mentioned in the above cause; not in any manner interested in the event of the said cause, do certify, that, on the thirteenth day of March, one thousand eight hundred and thirty-four, at my office, in the city of Philadelphia, I caused to come before me, John O. Stearns, of the city of Philadelphia, one of the witnesses named and produced to me on the part of the plaintiffs above mentioned, and have taken his deposition upon interrogatories furnished by the plaintiffs, which said interrogatories, and the answers and depostions thereto, are hereto prefixed and enclosed; that the said deposition was reduced to writing by me in the presence of said deponent, and was subscribed by him in my presence, after the same had been reduced to writing; that, previous to the taking thereof, the said deponent was by me carefully examined, cautioned, and sworn to testify the whole truth; that, at the time of taking the same, John O. Stearns resided in the city of Philadelphia, more than one hundred miles from the city of Washington, the place of trial of said cause, and that his so residing and being more than one hundred miles from the said city of Washington, was the reason and cause of taking the deposition; and that I have not given or served any notice on the said defendants, or their attorney or counsel, of the taking of the said deposition, or to be present thereat and put interrogatories if they should think fit, because neither the said defendants, nor any attorney or counsel of theirs, to my knowledge, was within one hundred miles of the city of Philadelphia. In testimony

whereof, I have inclosed the said deposition and interrogatories, and do hereby return the same under my hand, and with the reasons of taking the same, to the honorable the judges of the circuit court of the District of Columbia, for the county of Washington, this thirteenth day of March, one thousand eight hundred and thirty-four.

In testimony, I, the said mayor of the city of Philadelphia, [SEAL.] have hereunto set my hand, and caused to be affixed the corporate seal of said city, the day and year above written.

JOHN SWIFT, *Mayor.*

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN, *vs.* The CHESAPEAKE and OHIO CANAL COMPANY. } *Action in the Circuit Court of the District of Columbia, the county of Washington.*

Interrogatories to be put to Milo Winchel, on the part of Abram Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, the plaintiffs in the above suit or action,

Interrogatory 1st. Do you know the several parties, plaintiffs and defendants above named; and are you in any manner interested in the above suit or action, or in the event thereof?

Interrogatory 2d. Were the plaintiffs employed to construct any locks for the above named defendants? If yea, when, where, and how many?

Interrogatory 3d. Were you employed by the plaintiffs? If yea, when and in what capacity, and how long have you been acquainted with this kind of business?

Interrogatory 4th. Where were the above named locks situated, and was the character of their sites? Describe them particularly.

Interrogatory 5th. Do or do not some kinds of canal work command a preference over others in the right of occupancy or possession of the ground where the same are to be constructed? State your knowledge of the custom or usage established upon canals upon this subject.

Interrogatory 6th. Was there any and what estimate of the quantity of materials to construct said locks? State your knowledge.

Interrogatory 7th. What was the cost per foot lift of constructing said locks? State your knowledge thereof.

Interrogatory 8th. Was there any estimate of the quantity of cement to be used in said locks? If yea, state the quantity, who was to furnish it, and at what price, and also the quality of that which was delivered.

Interrogatory 9th. In what manner did the defendants deliver the cement for said locks; and did the plaintiffs suffer any loss or damage by the manner in which it was delivered? If yea, what was the effect upon the operations of the plaintiffs, and the amount of the loss or damage.

Interrogatory 10th. Were any and what orders given in relation to the completion of the work by the fourth day of July, 1830? State your knowledge of such orders, and their effect upon the operations of the plaintiffs.

Interrogatory 11th. Were any and what alterations made in the plan of said locks during the progress of the work? If yea, what was the cost of such alterations?

Interrogatory 12th. In what manner did the plaintiffs conduct their bu-

siness whilst building said locks, and what was the character of the workmanship upon the same?

Interrogatory 13. What quantity of cut stone was used in constructing said locks, and did the same exceed the estimates of the engineers? If yea, state how much and the cost of the same.

Interrogatory 14th. Were the plaintiffs hindered in the prosecution of their work upon said locks? If yea, what was the cause thereof, and what loss did it bring upon them?

Interrogatory 15th. Did the defendants ever sell and deliver to the said plaintiffs any and what quantity of cut stone, which had been assigned to defendants by J. and J. W. Maynard? State all your knowledge in relation thereto.

Interrogatory 16th. What was the health of the country along the line of said canal where said plaintiffs' work was situated, and how did the health affect the business of the plaintiffs?

Interrogatory 17th. Did the plaintiffs sub-contract any part of the work upon said locks? If yea, what part, and to whom, and how was the same performed or fulfilled? State your knowledge thereof.

Interrogatory 18th. Were the said locks completed by the plaintiffs, and were they approved and accepted by the said defendants, or their agents or engineers? State your knowledge thereof.

Interrogatory 19th. Were any of the cut stone of the plaintiffs injured or defaced by any person? If yea, by whom, and what time, and to what extent? State all your knowledge relating thereto.

Interrogatory 20th. Do you know, or are you informed of any thing further, that is material either to the plaintiffs or defendants in the above suit or action? Declare the whole truth.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN,

vs.

The CHESAPEAKE and OHIO CANAL COMPANY.

} *Action in the Circuit Court of the District of Columbia for the county of Washington.*

The answers of Milo Winchell, a witness produced and sworn on the part of Abram Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, the plaintiffs in the above suit or action, to the several interrogatories hereunto annexed.

Response 1st. To the first interrogatory, this deponent, answering, says; that he is acquainted with the parties above named, and that he has no interest whatever in the suit, or in the event thereof.

Response 2d. To the second interrogatory, this deponent, answering, says; that the above named plaintiffs in the years 1829 and 1830, did construct eight locks for the defendants, upon the Chesapeake and Ohio canal, to wit, locks No. 5, 6, 8, 15, 16, 17, 18, and 20.

To the third interrogatory, this deponent, answering, says; that he was employed by the plaintiffs upon the Chesapeake and Ohio canal in the capacity of superintendent of the mechanics upon said locks, and directed the cutting and preparing the stone for the said locks; that he entered the service of the plaintiffs about the middle of March, 1829, and continued in their

employment until the completion of the said locks, the last of August, 1830. This deponent has been employed in the business in building locks and other works upon the different canals in New York, Massachusetts, and New Jersey, for ten years.

4. To the fourth interrogatory, this deponent, answering, says; that locks numbers 5 and 6 were situated near the Little Falls, about ten rods from the the river, affording tolerable conveniences for stone, yards, &c.; number 8 was situated between three and four miles west of 5 and 6, according to the recollection of this deponent, on section No. 7, a few rods from the river, where the water was shallow and difficult of access with loaded boats; numbers 15, 16, 17, 18 and 20 were situated at or near the Great Falls, the two first of which were difficult of access, being one half or three fourths of a mile from the river, a rough stony tract of land intervening; the others were equally difficult of access, the materials of which were transported about one and a quarter miles from the river over a bad road.

To the fifth interrogatory, this deponent, answering, says; that, on all the canals where he has been employed, the contractors for the locks and other masonry have uniformly had a preference in the possession of the ground necessary for roads, yards, &c., to deposite their materials, &c.

To the sixth interrogatory, this deponent, answering, says; that he knows nothing of any estimate, except that he has often and always heard it stated by the engineers and agents of the canal company to these plaintiffs, that six thousand feet of cut face stone, and three thousand bushels of cement were the estimated quantities for building a lock of eight feet lift on the Chesapeake and Ohio canal; and this deponent further knows, that the engineers always in making their monthly estimates, were guided by the above named rates of quantities.

To the seventh interrogatory, this deponent, answering, says; that he was intimately acquainted with, and well understood the amount of every expense appertaining to the stone, and masonry of locks 8, 15, 16, 17, 18 and 20, as they were constructed under this deponent's superintendence; and that he was hardly absent from the works a single day during the whole time of their building. This deponent would, therefore, declare, from his personal knowledge, that the average cost of said locks was at least fifteen hundred dollars per foot lift, exclusive of the expense of excavating the pits, embankment, and water bailing.

To the eighth interrogatory, this deponent, answering, says; that he knows that the engineers and agents of the canal company, always stated that the estimated quantity of cement for a lock of eight feet lift, upon this canal, was three thousand bushels, and that it was to be delivered upon the works by the defendants at forty cents per bushel. In relation to the quantity of cement furnished by the defendants, this deponent can only say, that the Shepardstown cement, was greatly inferior to the New York cement, and that the Tuscarora cement was very little, if any, better than common lime.

To the ninth interrogatory, this deponent answering says; that the defendants delivered the cement very irregularly, in small quantities which caused very great hindrance and loss of time, and expense to these plaintiffs, by keeping a very large force of mechanics, common laborers and teams lying idle and upon expense of wages and board whilst waiting for cement; the precise loss and damage incurred deponent cannot state, but from his best recollection, would say, that the loss of time thus incurred from the first of March, 1830, until the completion of the said locks in August there-

after, could not be less than forty days, at an expense to these plaintiffs of from one hundred and sixty to one hundred and seventy dollars per day; besides the damage was very serious by delaying the work until the sickly months of July and August, which was the cause of a great advance in all kinds of labor to induce laborers to remain upon the line of the canal at this season of the year, all this expense and risk might have been saved to these plaintiffs, had the cement been furnished as agreed on the part of the defendants, which would have enabled the plaintiffs to have completed the whole of their work early in June, 1830.

To the tenth interrogatory, this deponent, answering, says: that he knows that general and public orders from the engineers, agents, and the president of the canal company, were circulated early in May, 1830, along the whole line of the canal; that the canal must at all hazards be completed and ready for the admission of the water by the 4th July, 1830; and deponent further states, that the plaintiffs were repeatedly ordered and directed by the president of the company and their engineers and agents, to retain all their force, and to increase the same, let the expense be what it might, in order to accomplish the completion by the 4th July; and deponent further says, that the plaintiffs did strictly pursue said orders and instructions, and that immediately on the circulation of such orders, the effect was to cause a very great advance in all kinds of labor, and especially mechanical, through the whole line; and deponent has no doubt, but the effect of these orders was the cause of advancing wages from 33⅓ to 40 per cent.

To the eleventh interrogatory, this deponent, answering, says: that there were alterations and changes made in the plans and forms of the lock culverts, at three different times during the building of the same, which was the cause of great trouble and expense, by changing the size and form of the culvert stone, and obliged the plaintiffs to get three distinct set of expensive cut stone, for precisely the same use and purpose; two sets of which were consequently lost or nearly so, not being suitable for any other work about the locks, except some few of which were used as common ashler. The amount of loss and damage incurred by the plaintiffs in consequence of these changes, was not less than one thousand dollars. This deponent further says, that these changes were made in pursuance of orders from the engineers.

To the twelfth interrogatory, this deponent, answering, says; that the plaintiffs conducted their business in the most prudent, saving, and accurate manner, during the whole operations of their work; and that he has never known any men or company of men upon any public or other works who have excelled them in the prosecution of heavy and difficult jobs.

This deponent can state, in relation to the workmanship of all the said locks, that he has never seen any locks equal to them in the style and superior quality of the workmanship upon this or any other canal.

To the thirteenth interrogatory, this deponent, answering, says: that the quantity of cut stone used in each of said locks was six thousand six hundred and fifty-five feet, exceeding the estimates of the engineers six hundred and forty-five feet. It became necessary to quarry and cut these stone late in the season, when wages were greatly advanced, in consequence of which they cost the plaintiffs not less than fifty cents per foot, and the boating and delivery at least three dollars per ton.

To the fourteenth interrogatory, this deponent, answering, says: that the plaintiffs experienced much delay and hindrance whilst building their locks at the Great Falls, by the interference of the work upon section 18, under

Messrs. Bargy and Guy, by the passing and repassing of carts, wagons, and teams, and doing much injury by breaking and defacing the cut stone, thereby making it necessary to re-cut many of them two or three times before they were laid in the lock; and, also, much time was lost on account of the heavy rock blasting of Messrs. Bargy and Guy, immediately at and about the said locks, which obliged the whole force of plaintiff's men and teams to leave their work many times in a day, and go off at a considerable distance to escape the danger of the blasts, which occasioned serious loss. This deponent says, that, in consequence of these difficulties, the expense of the work was at the lowest rate enhanced twenty-five per cent on locks 17 and 18 during the whole time the section work continued to interfere with the operations of the plaintiffs, which was not less than two months.

To the fifteenth interrogatory, this deponent, answering, says; that the defendants did sell to the said plaintiffs a quantity of cut stone got out by J. and J. W. Maynard, upon the farm of Mary Broome, of Montgomery county, Maryland, in the winter of 1829. These were all the stone of Maynard; nineteen hundred and sixty feet of cut stone, and four hundred and seven feet of quarried stone; that this deponent superintended in quarrying and cutting them, and knows that an estimate of the quantity of these stone was furnished by the engineers of the company to J. and J. W. Maynard, in the winter of 1829, upon which said Maynards received money from the defendants, that such estimate was made by the engineers from the representation of Maynards; and that no measurement was made of the stone at the time of making said estimate; and this deponent says, that, at the commencement of the plaintiff's work upon the said locks, in 1829, he measured all the said stone got out by said Maynards for the said locks, which resulted in the number of feet above stated. And this deponent further states, that the stone got on the farm of Mary Broome were afterwards attached, levied upon, and sold, by the sheriff of Montgomery county, Maryland, on the account of Mary Broome against J. and J. W. Maynard, and that said sale was in the early part of April, 1830.

To the sixteenth interrogatory this deponent says, that he knows that the general health of the whole line of said canal was very bad from the middle of June to the middle of October, each year; and more especially so at and in the vicinity of the Seneca stone quarries, and at the Great Falls of the Potomac, which seriously and injuriously affected the operations of the plaintiffs.

To the seventeenth interrogatory, this deponent answering, says, that he knows the plaintiffs sub-contracted to Robert and William R. N. Warren the laying of the masonry of locks No. 18 and 20, and the embankment of some of the said locks; and said plaintiffs sub-contracted to Emery, Cook, and Stewart, the building of lock 8; and also sub-contracted to Joseph Petton the building of the lock gates: but this deponent knows that each and every one of the above named sub-contracts were abandoned, and the work came back upon the hands of the plaintiffs, and was by them completed, because of the total inability of any of the above named sub-contractors to perform the same.

To the eighteenth interrogatory, this deponent, answering, says, that he knows that the eight locks hereinbefore mentioned, were all fully completed in the best manner, and to the acceptance and satisfaction of the engineers having charge of the work, excepting the wood and iron work, which was not entirely finished when he left there.

To the nineteenth interrogatory, this deponent, answering, says, that Robert Leckie, superintendent of stone work and masonry on said canal, about the first of June, 1829, entered the stone yard of the plaintiffs, at the Seneca quarries, and picked, hammered, and defaced a large quantity of plaintiffs' best cut lock stone, which were immediately thereafter examined by the engineer in chief and the resident engineer, and were by them pronounced to be all good stone: this deponent, at the time, examined the stones so injured and defaced, and thinks the damage done the plaintiffs was not less than two hundred dollars.

To the twentieth interrogatory, this deponent, answering, says, that he knows nothing further, material either to the plaintiffs or defendants, except it may be proper to state that the plaintiffs were damaged three hundred and fifty dollars by cutting headers into stretchers; this came through the fault of the engineers and agents of the canal company, by urging more headers to be cut than the proportion of headers stated in the specification: the damage was incurred by the cutting of the ends and extra boating of so much more dead work as were required on the heads, the transportation of which might have been saved to the plaintiffs, had they not been compelled by the engineers to get more than the proportion of headers above named, which had to be used in place of stretchers, because they had been ordered by the engineers to get them.

WILL. MINCHEL.

Taken, sworn, and subscribed this 18th day of February, 1834, before me,

WM. SISSON,

First Judge of Wayne County Court of Common Pleas.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN, *vs.* The CHESAPEAKE and OHIO CANAL COMPANY. } *Action in the Circuit Court of the District of Columbia. for the county of Washington.*

I, William Sisson, first judge of the county courts of common pleas for the county of Wayne, in the State of New-York, not being of counsel nor attorney for neither of the parties mentioned in the above cause, nor in any manner interested in the event thereof, do hereby certify, that, on this eighteenth day of February, in the year one thousand eight hundred and thirty-four, at my office, in the town of Lyons, in the county of Wayne, and State of New York, I caused to come before me Milo Winchel, a witness named and produced to me on the part of the plaintiffs in the above cause, and have taken his deposition upon interrogatories furnished by the said plaintiffs, which said interrogatories, and the answers or depositions thereto, are hereto prefixed and enclosed; that the said deposition was reduced to writing by me in the presence of the said deponent, and was subscribed by him in my presence, after the same had been so reduced to writing; that, previous to the taking thereof, the said deponent was by me carefully examined, cautioned, and sworn to testify the whole truth. That, at the time of taking the same the said Milo Winchel resided at Cazenovia, in the county of Madison, and State of New York, more than one hundred miles from the city of Washington, the place of trial of the said cause; and that his so residing and being more than one hundred miles from the said city of Washington, was the reason and cause of taking the said disposition; and that I have not given or served, nor caused to be given or served, any no-

tice on the said defendants, or their attorney or counsel, of the taking of the said deposition, or to be present thereat, and put interrogatories if they should think fit, because neither the said defendants, nor any attorney or counsel of theirs, to my knowledge, was within one hundred miles of the town of Lyons aforesaid.

In testimony whereof, I have enclosed the said deposition and interrogatories, and hereby return the same under my hand and seal, with the reasons of taking the same, to the honorable the judges of the circuit court of the District of Columbia, for the county of Washington, this eighteenth day of February, in the year one thousand eight hundred and thirty-four.

WM. SISSON, [SEAL.]

First Judge of Wayne county Court of Common Pleas.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN, *vs.* The CHESAPEAKE and OHIO CANAL COMPANY. } *Action in the Circuit Court of the District of Columbia, for the county of Washington.*

Interrogatories to be put to Henry Smith, on the part of Abram Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, the plaintiffs in the above suit or action.

Interrogatory 1st. Do you know the several parties, plaintiffs and defendants, above named, and are you in any manner interested in the above suit or action, or in the event thereof?

Interrogatory 2d. Did or did not Abram Knapp, Benjamin F , Henry Acker, and Fredus Chapman, the above named plaintiffs, construct any lock or locks for the above named defendants? If yea; How many and when?

Interrogatory 3d. Were you ever employed upon the Chesapeake and Ohio Canal? If yea, by whom and when, and in what capacity? And how long have you been acquainted with this kind of business?

Interrogatory 4th. Where were the above named locks located, and what was the character of their sites or bottoms? Describe the same particularly.

Interrogatory 5th. Do or do not some kinds of canal work command a preference over others in the right of occupancy or possession of the ground where the same are to be constructed? State all your knowledge of the custom or rule established upon canals on this subject.

Interrogatory 6th. Did or did not the work upon the section interfere with and impede the operations of the plaintiffs? State all your knowledge in relation to the same.

Interrogatory 7th. Have you knowledge of any and what orders and directions from the said defendants to the said plaintiffs, respecting the completion of said locks by the 4th day of July, 1830? State particularly all you know thereof.

Interrogatory 8th. How were the plaintiffs affected by the orders of the defendants requiring the completion of said locks by the 4th day of July, and how did such orders affect the price of labor? Declare your knowledge of the same.

Interrogatory 9th. What was the state of health generally upon the line of said canal, and particularly upon that part where the plaintiffs were situated?

Interrogatory 10th. By whom was the cement to be furnished for the construction of said locks? In what quantities? At what times and in what manner was it to be delivered? And what was the quality thereof?

Interrogatory 11th. Were or were not the plaintiffs hindered and delayed during the building of said locks by the manner in which the said defendants furnished the cement? If yea, what amount of loss did they sustain in consequence thereof?

Interrogatory 12th. What was the reasonable cost or value per foot lift of constructing said locks, and of the other descriptions of work done by the said plaintiffs connected with said locks? State all your knowledge thereof.

Interrogatory 13th. What was the quality and character of the workmanship upon said locks? State all your knowledge thereof.

Interrogatory 14th. How and in what manner did the said plaintiffs conduct or manage their operations whilst engaged in the construction of the above named locks?

Interrogatory 15th. Did or did not the plaintiffs re-let any part or portion of said locks, or the works connected therewith, to sub-contractors? If yea, what part and how much thereof and to whom, and how or in what manner did such sub-contractors perform or fulfil their contracts? State all your knowledge thereof.

Interrogatory 16th. What was the difference between the cost or expense of the bottoms or foundations of the locks constructed by the plaintiffs, to wit, locks 15, 16, 17, 18, and 20, and ordinary wooden foundations or bottoms?

Interrogatory 17th. Do you know any thing further which is material to the plaintiffs or defendants in the above entitled suit or action? Declare the whole truth.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN,
vs.
The CHESAPEAKE and OHIO CANAL COMPANY.

Action in the Circuit Court of the District of Columbia, for the County of Washington.

The answers of Henry Smith, a witness, produced and sworn on the part of Abram Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, the plaintiffs in the above suit or action, to the several interrogatories hereunto annexed.

Response 1st. To the first interrogatory this deponent, answering, says, that he is personally acquainted with Benjamin Ford and Fredus Chapman, two of the plaintiffs above named, and knows that there is a company entitled "The Chesapeake and Ohio Canal Company," and is acquainted with Charles F. Mercer, esq., president, and Daniel Van Slyke and other engineers for said company; and that he has no interest, directly or indirectly, in the above suit, or in the event thereof.

Response 2d. To the second interrogatory this deponent answers and says, that the above named plaintiffs built locks No. 15, 16, 17, 18, and 20; locks, No. 15 and 16, were constructed on section No. 17; and locks No. 17, 18, and 20 on section No. 18, of the Chesapeake and Ohio Canal, and opposite or near to the Great Falls of the Potomac river. That this deponent was informed by the engineers of the canal company and others, that plaintiffs built other locks on the line of said canal, between those

above mentioned and the city of Georgetown, of which, however, this deponent has no personal knowledge. His acquaintance with locks No. 15, 16, 17, 18, and 20, commenced about the first of April, 1830, at which time, according to his recollection, the pits for No. 15 and 16 were excavated, and the dead masonry was being constructed; and for locks, No. 17, 18, and 20, the pits were partially excavated.

Response 3d. To the third interrogatory this deponent answers, that he was employed in the Chesapeake and Ohio Canal on section No. 18, in the capacity of bookkeeper, from about the first of April, 1830, until the completion (sometime in September thereafter) by Messrs. Baray and Guy; then as deputy superintendent of the line from section No. 15 to Seneca creek, until compelled to leave the line by sickness; and. finally, at section No. 15, in repairing large breaches occasioned by the sliding of the towing-path bank into the river. He has been acquainted with all the different branches of canaling, lock-building, &c., in the States of New York, Pennsylvania, and Maryland, since A. D. 1826.

Response 4th.—To the fourth interrogatory deponent answers and says, that locks No. 15 and 16 were located on section No. 17, on Bear island, in what appears to be an ancient channel of the Potomac river. The original appearance of the sites he can only describe generally; (they having been commenced previous to his acquaintance therewith;) the bottoms were of granite rock, of a character very difficult to make even and level for the reception of masonry, and situated about one-half mile from the point where the materials were landed from the river; which distance deponent believes plaintiffs constructed a road over rocks, ravines, &c., at great expense, on which to transport materials. The landing of the stone was effected by a capstan and crane, raising them upon an almost perpendicular bank or rock thirty feet in height. These difficulties combined would necessarily add greatly to the construction, the aggregate of which cannot be stated with certainty, but he believes the increase to be equal to not less than fifteen per cent., nor over twenty-five per cent. on the whole cost of building, above that of locks built on a fair location, and affording conveniences for stone yards roads, &c., say such as locks No. 19 and 20; lock No. 17 was located on a detached craggy rock or island between an apparent ancient channel of the Potomac river, and one now occupied by said river, and surrounded on every side by gulfs and ravines passable only to *to* the traveller on foot, until a communication was formed by the construction of the towing-path bank by the contractors of section No. 18. On this site was hewn out of solid granite a base for the foundation of the lock previous to the entire completion of the canal bank. But as soon as the towing-path was so far advanced as to admit of a passage, the plaintiffs simultaneously commenced the work of delivering and laying stone, subject continually to delays and damage of stone by the frequent collision of their own teams and the teams belonging to the section contractors, and necessarily employed in making the towing-path, the construction of which was absolutely necessary to the prosecution of the work upon the lock, as the ground in the vicinity of the lock would not at all admit of a deposite yard for materials sufficient for one day's use. Consequently, almost every stone was first designated by the mason, and then drawn from the stone-yard in the vicinity of the lock No. 20, and thereby increasing the expense twenty five per cent. above the price per foot lift of rock No. 20. Lock No. 18 was located at the head of the old channel, and at the head of the lock the excavation was solid rock and was

attended with much difficulty and expense, owing to its peculiar conformation, standing nearly on edge and not yielding readily to the effect of powder. A part of the excavation of this pit near the lower end consisted of a deposite of earth amongst large detached pieces of rock, the removal of which was attended with great expense, owing partly to the constant oozing of water from either side, and thereby requiring a great deal of labor in bailing, draining, &c. These deposites of earth were required to be excavated to the rock which, in some cases, was of considerable depth, and was replaced by masonry, but the quantity so removed and replaced cannot be stated with proper accuracy to convey definite information; much time was also necessarily lost on this lock to plaintiffs in the passing of teams employed on the section, and although not as difficult as No. 17, was worth $100 per foot lift more than lock No. 20. Lock No. 20 was located near the upper end of section No. 18, and about one mile from the point on the river where the materials were landed for its construction, and also for the construction of lock No. 17 and 18. The location affording facilities for stone yard, lime houses, &c.; and, in the opinion of deponent, was built for a much less sum than either of the other locks, or for about the sum of $1,400 per foot lift, exclusive of digging the pit, puddling embankment, &c., &c.

Response 5th. To the fifth interrogatory this deponent answers and says, that, on all canals where he has been engaged, the contractors for incidental work have had the preference in occupancy of the ground necessarily required for roads, yards, &c.

Response 6th. To the sixth interrogatory deponent answers, that much delay and damage was occasioned to the plaintiffs in consequence of the continual passing and repassing of teams employed on section No. 18, particularly to the prosecution of locks No. 17 and 18, the necessity for which is described in answer to the 4th interrogatory.

Response 7th.—To the seventh interrogatory, this deponent answers, that he knows that orders were circulated along the line, to have the canal prepared for the reception of the water on the fourth day of July.

Response 8th. To the eighth interrogatory this deponent answers and says, that the orders issued by the defendants made it necessary for the plaintiffs to employ an extra number of laborers and mechanics upon their work, and such orders, having been disseminated along the whole line of the canal, induced such laborers and mechanics to demand higher wages, which the plaintiffs were compelled to pay, to enable them to comply with the orders of the defendants at least one-third, and common labor about one-fourth or one-fifth.

Response 9th. To the ninth interrogatory deponent will answer, that, from the latter part of June until he left that part (Potomac Falls) in September, there was much sickness and many sudden deaths, and so great was the consternation of the laboring class, that nothing but the most extravagant prices could induce white laborers to continue on the lines; and further, the contractors were compelled to employ a large number of slaves, at high prices, to complete their work as early as they were required

Response 10th. To the tenth interrogatory this deponent replies, he was informed by the agents of the defendants that the cement was to be furnished by the canal company, in quantities to supply the demand of contractors, at 40 cents per bushel, and that the engineers and agents in the em-

ploy of the defendants frequently condemned the cement as greatly inferior in quality.

Response 11th. To the eleventh interrogatory this deponent will answer, that much delay was occasioned to the plaintiffs by the non-delivery of cement in quantities to meet their demands; the consequence was, they were compelled to keep their hands under pay without labor, and deferring the completion of their work until the more sickly season, where labor, if procured at all, was obtained at an advance of from twenty to thirty-three per cent. It is believed by this deponent, that if sufficient quantities had been delivered in season, that the locks would have been completed by the fourth of July. That, at the time locks No. 18 and 20 were in progress, the plaintiffs often complained of a scarcity of cement, and one particular time they were lying idle for a number of days with a large force of hands, and, as deponent understood at the time, they were all under pay from the plaintiffs. The number of days alluded to above is believed to be two weeks or more; and many other times deponent knows of there being a want of cement, but the aggregate cannot be positively stated.

Response 12th. To the twelfth interrogatory deponent answers and says, that, relating to the price per foot lift, this interrogatory is answered by the answer to the fourth interrogatory, and will only answer concerning the excavation of pits, &c., &c., for locks No. 17, 18, and 20.

Lock No. 17,	Excavation, pr. c. yd. . .	$1 12½
" "	Puddling, do do . .	44
" "	Embankments, do . .	37½
Lock No. 18,	Excavation, do . .	1 37½
" "	Puddling, do . .	37½
" "	Embankments, do . .	30
Lock No. 20,	Excavation, do . .	1 12½
" "	Puddling, do . .	34
" "	Embankments, do . .	30

Response 13th. To the thirteenth interrogatory deponent answers, that, having been intimately acquainted with locks on the different canals in New York, Pennsylvania, and the Chesapeake and Ohio Canal, he is positive that he never saw any work bearing a fairer exterior than the locks No. 15, 16, 17, 18 and 20; and having been on some one of said locks almost daily during the building of the same, can say, without doubt or hesitation, that he believes the work equally as permanent as any locks he ever saw.

Response 14th. To the fourteenth interrogatory deponent answers, that he was intimately acquainted with the proceeding of the plaintiffs, being daily past their work on section 18, and without hesitation will say, that but few men could overcome the difficulties which the plaintiffs had to *encumber*, and in every department of their business, they manifested judgment, skill, and perseverance, seldom equalled and perhaps never exceeded.

Response 15th. To the fifteenth interrogatory this deponent answers and says, that the masonry of locks No. 18 and 20 were let to sub-contractors, viz. Messrs. Robert Love and W. R. N. Warren, and, owing to their inability to perform the work, (the cause of which is unknown to deponent,) the plaintiffs were compelled to complete them; other small jobs were left by sub-contractors and completed by the plaintiffs.

Response 16th. To the sixteenth interrogatory deponent answers, that the expense of repairing the craggy points of rock for the reception of ma-

sonry and the filling of crevices, &c., raising deficient parts to a level, grouting and making the bottom water-tight, and placing the mitre-sills, would be materially more than the placing of a timber foundation, but the extra amount of difference cannot be stated by him.

Response 17th. To the seventeenth interrogatory, deponent answers, that the landing of all the cut stone cement, &c., for locks No. 17, 18 and 20, was at a place on the river about one mile from the nearest lock, (No. 20,) in the vicinity of which was the only place of general deposite; the ground near locks No. 17 and 18 not affording room for a yard, the consequence was, that all the stone hauled and deposited in the said yard, and to be used in locks No. 17 and 18, were required to be reloaded and taken to their final destination, as they were required to be used. And, to conclude, deponent answers he has not omitted any thing within his knowledge which would at all affect the interest of either of the parties in this suit; and further deponent saith not.

HENRY SMITH.

Taken, sworn, and subscribed, this 12th day of February, 1834, before me,
WM. SISSON,
First Judge of Wayne County Courts of Common Pleas.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN,
vs.
The CHESAPEAKE and OHIO CANAL COMPANY.

Action in the Circuit Court of the District of Columbia for the County of Washington.

I, William Sisson, first judge of the county courts of common pleas for the county of Wayne, in the State of New York, not being of counsel nor attorney for either of the parties mentioned in the above cause, nor in any way interested in the event thereof, do hereby certify, that, on this twelfth day of February, in the year one thousand eight hundred and thirty-four, at my office, in the town of Lyons, in the county of Wayne, and State of New York, I caused to come before me, Henry Smith, a witness named and produced to me on the part of the plaintiffs in the above cause, and have taken his deposition upon interrogatories furnished by said plaintiffs, which said interrogatories, and the answers or depositions thereto, are hereto prefixed and enclosed; that this deposition was reduced to writing by the said Henry Smith, the deponent, in my presence, and was subscribed by him in my presence, after the same had so been reduced to writing by him; that, previous to the taking thereof, the said deponent was by me carefully examined, cautioned, and sworn to testify the whole truth: that, at the time of taking the same, the said Henry Smith resided at the town of Seneca Falls, in the county of Seneca and State of New York, more than one hundred miles from the city of Washington, the place of trial of the said cause, and that his so residing and being more than one hundred miles from the said city of Washington was the reason and cause of taking said deposition; and that I have not given or served, or caused to be given and served, any notice on the said defendants or their attorney or counsel, of the taking of the said deposition, or to be present thereat, and put interrogatories, if they should think fit, because neither the said defendants, nor any attorney or counsel of theirs, to my knowledge, was within one hundred miles of the town of Lyons, in the county of Wayne, and State of New York.

In testimony whereof, I have enclosed the said depositions and interrogatories, and do hereby return the same under my hand and seal, with the reasons of taking the same, to the honorable the judges of the circuit court of the District of Columbia, for the county of Washington, this twelfth day of February, in the year one thousand eight hundred and thirty-four.

WM. SISSON,
First Judge of the County Court of Common Pleas of the County of Wayne.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, AND FREDUS CHAPMAN, *vs.* The CHESAPEAKE and OHIO CANAL COMPANY. } *Action in the Cicuit Court of the District of Columbia for the county of Washington.*

Interrogatories to be put to Moses Randall, a witness on the part of Abram Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, plaintiffs in the above suit or action.

Interrogatory 1st. Do you know the several parties, plaintiffs and defendants above named, and are you in any manner interested in the above suit or action, or in the event thereof?

Interrogatory 2d. Were the plaintiffs employed to construct any lock or locks for the above named defendants? If yea, when, where, and how many?

Interrogatory 3d. Were you employed by the plaintiffs? If yea, when, and in what capacity, and how long have you been acquainted with lock building?

Interrogatory 4th. What was the character of the location or sites of the locks built by the plaintiffs? State your knowledge of the same and the method of transporting the materials to the sites, and every thing connected with the delivery of said materials.

Interrogatory 5th. Do or do not some kinds of canal work command a preference over others in the occupancy of the ground where they are to be done?

Interrogatory 6th. What was the cost per foot lift of constructing the locks built by the plaintiffs? State your knowledge thereof.

Interrogatory 7th. Was there any estimate of the quantity of cement to be used in said locks? If yea, state the quantity and who was to furnish it, and at what price, and also the quality of that which was furnished; state your whole knowledge thereof.

Interrogatory 8th. Were or were not the plaintiffs hinderd or delayed in their operations upon these locks? If yea, state the cause and amount of such hindrance, and how it effected the business of the plaintiffs?

Interrogatory 9th. Were any and what orders given to the plaintiffs by the defendants relating to the completion of the work by the 4th day of July, 1830? State your knowledge of such orders, and their effect upon the operations of the plaintiffs.

Interrogatory 10th. Did the plaintiffs under-let or sub-contract any part of the work upon said locks? If yea, what part and to whom, and how was the same performed or fulfilled? State your knowledge thereof.

Interrogatory 11th. Did or did not the plaintiffs boat or transport any cement for the defendants? If yea, state how much and the cost therefor.

Interrogatory 12th. Did the plaintiffs construct any waste rivers for the

defendants? If yea, when, where, and how many, and what was the cost thereof?

Interrogatory 13th. Did, or did not, the plaintiffs do any water-bailing in the construction of these locks? If yea, state how much, when and where done, and the cost thereof?

Interrogatory 14th. Have the defendants or their agents had any interviews with you concerning or relating to your knowledge of the matters in controversy between plaintiffs and defendants, or in relation to your testimony therein?

Interrogatory 15th. What was the general health of the country along the line of said canal where the work of said plaintiffs was situated, and how did it effect their business?

Interrogatory 16th. Do you know, or are you informed of any thing further that is material either to the plaintiffs or defendants in the above suit or action? Declare the whole truth.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, AND FREDUS CHAPMAN, *vs.* The CHESAPEAKE and OHIO CANAL COMPANY. } *Action in the Circuit Court of the District of Columbia for the county of Washington.*

The answer of Moses Randall, a witness produced and sworn on the part of the above named plaintiffs, to the several interrogatories hereunto annexed.

Response 1st. To the first interrogatory, this deponent, answering says, that he is well acquainted with the parties above named, and that he is not interested, directly or indirectly, in the suit or in the event thereof.

Response 2d. To the second interrogatory, this deponent, answering, says, that, at the time he came upon said canal, in the fall of 1829, the said plaintiffs were engaged in building locks number 5, 6, 8, 15, 16, 17, 18, and 20, for the defendants, on the Chesapeake and Ohio canal.

Response 3d. To the third interrogatory, this deponent, answering, says, that he was employed by the plaintiffs in the fall of 1829, by the day, in superintending the building of lock No. 15; and, early in the spring of 1830, this deponent commenced laying the masonry of locks 16 and 17, as sub-contractor under the plaintiffs; that, during the summer following, they were completed. This deponent has, for twelve years past, been generally engaged in this kind of business, and professes to have a thorough knowledge and experience thereof.

Response 4th. To the fourth interrogatory, this deponent, answering, says, that locks No. 15 and 16, were located on the 17th section of said canal, near the Great Falls of the Potomac, in one of the most rough and difficult places of access in which he ever knew canal work done; that all the materials for these two locks were necessarily landed below the Great Falls, one half or three quarters of a mile from the sites of these locks, which was the only place in the neighborhood which could be approached by boats; the landing of all the materials at this point was attended with great expense, and trouble, and risk; the stone all having to be hoisted from the boats by a crane worked by horse power, up a perpendicular height of thirty feet, or thereabouts, the boats were necessarily confined immediately under the stone during the whole of this operation, thereby subjecting the boat and load to great danger and risk, from the breaking of the rigging and falling of

the heavy stone, many of which weighed three or four tons; and this deponent knows that the plaintiffs actually lost two boats and their loads by the falling of stone whilst unloading at this point, one of which had upon, when sunk, a full load of very large and valuable cut stone, which cost not less than four hundred dollars; this deponent is unacquainted with the cost of the other load. At this landing the shore was steep, rocky, and the water from twenty to sixty feet in depth. This deponent further says, that, after these stones were landed upon the top of the rock, they were moved several rods up a considerable ascent, by means of a temporary rail-way, to a small stone yard, and, from this, were removed by *a* teams over a road of the most rough and difficult kind, across Bear island to the lock sites, where it was difficult to find a spot sufficiently smooth to lay a single stone without its being defaced by the sharp craggy points of granite rocks which nearly covered the ground; this necessarily caused the expense of recutting or dressing over many of the stones used in these locks. Lock 17 was located on the lower end of section No. 18, and was more difficult of access than either 15 or 16, as it was necessary to land the materials for this lock on section No. 20, and transport them over a bad road, one and a quarter miles, to a stone yard, in the vicinity of lock No. 20, and were removed from this yard singly to the lock, as they were wanted for use, there being no room to deposite materials at the lock faster than they were laid in the work. Lock No. 18 was as difficult of access as locks 15 and 16, and the materials were landed and delivered at the same stone yard of those for lock 17, and were, from this yard, drawn, stone by stone, as required for use in laying the lock, as in 17, there being no room for a stone yard. Lock No. 20 was less difficult of access and afforded a tolerable stone yard; the materials for this lock was landed at the same landing, and transported over the same road that they were for locks 17 and 18, one and a quarter miles.

Response 5th. To the fifth interrogatory this deponent, answering, says, that it has been the custom and usage upon canals where he has been employed, to give a preference in the possession or occupying the grounds to lock work for roads and yards, to deposite the stone and other materials, to prevent their being injured.

Response 6th. To the sixth interrogatory this deponent, answering, says, that locks 15, 16, 17, 18 and 20, cost, on an average, not less than fifteen hundred dollars per foot lift, exclusive of preparing the pits, embanking, puddling, making roads, and water-bailing. Deponent was not sufficiently acquainted with locks number 5, 6, and 8, to state their cost of construction.

Response 7th. To the seventh interrogatory this deponent answering, says, that he has often heard Charles F. Mercer, the president of the canal company, as well as the engineers, state, that the estimated quantity of cement for a lock of eight feet lift upon this canal, was three thousand bushels, and that it was to be delivered upon the works, by the defendants, at forty-cents per bushel; as regards the quality of the cement furnished by the defendants, deponent would state, that that from Shepherdstown was greatly inferior to the New York cement, and that the Tuscarora cement was not any better, if as good as common lime.

Response 8th. To the eighth interrogatory, hereunto annexed, this deponent, answering, says, that these plaintiffs were greatly hindred and delayed, nearly the whole time they were employed in building these locks, by the irregular manner in which the cement was delivered, and that the amount of such hindrance upon locks 15, 16, 17, 18 and 20, from the 1st of March,

1830, till their completion in August following, was not less than forty entire days, at an expense to these plaintiffs of one hundred and seventy dollars per day. There were eighteen days at one time in which the plaintiffs received but two small loads of cement for the use of two hundred men, being insufficient to supply them one day, besides the damage was very serious by protracting the work until the sickly months of July and August, which was the cause of a great advance in all kinds of labour, to induce the laborers to remain upon the line of the canal at this season of the year. All this risk might have been saved to these plaintiffs, had the cement been furnished as promised on the part of the defendants, which would have enabled the plaintiffs to have completed their whole work early in June, 1830; and deponent further says, that the plaintiffs suffered great hindrance and loss by the interference of the work under Messrs. Bargy and Guy, on section eighteen, by the breaking of the face stone, by coming in contact with their carts and waggons, and by the men being driven from their work many times in a day to escape the dangers from the heavy rock blasting upon said section; the damage done to the plaintiffs during this interference deponent cannot precisely state, but knows it was great. This deponent recollects that, in one instance, on lock 18, a large rock was thrown against the wing wall of the lock, and so deranged several courses of their work as to require relaying; in several other instances, the work of the plaintiffs, on locks 17 and 18, was deranged by the falling stones breaking and displacing the cut stones in the walls. The plaintiffs remonstrated against these injuries, and threatened to abandon the work, in consequence of which, Daniel Van Slyke, the agent of the defendants, agreed to indemnify them against all damages arising from this source.

Response 9th. To the ninth interrogatory this deponent, answering, says, that he knows that general and public orders were circulated along the line of canal early in May, 1830, by Charles F. Mercer, the president of the canal company, as well as by the engineers, that the canal must be ready for the admission of the water by the fourth day of July, 1830, be the expense what it might. And deponent knows that these public orders were the cause of an immediate advance in all kinds of labor of more than thirty-three and one-third per cent, which the defendants were compelled to pay in pursuing the orders of the defendants, (which they strictly complied with) by retaining all their force and constantly increasing the same, which, in consequence of these orders, were employed at great disadvantage. This deponent further says, that the plaintiffs sustained damage in complying with these orders to fifteen or sixteen hundred dollars, as this deponent verily believes.

Response 10th. To the tenth interrogatory this deponent, answering, says, that he knows that the plaintiffs sub-contracted to Robert Love and William R. N. Warren, the laying of the masonry of locks 18 and 20, and the embanking of some of the said locks, and the boating of some of the stone; and the said plaintiffs sub-contracted to Emery, Cook, and Stewart, the building of lock number 8, and to Joseph Petton the building of the lock gates; but this deponent knows that each and every part of the work let or sub-contracted as above stated, came back into the hands of the said plaintiffs in an unfinished state, on account of the inability of the sub-contractors to perform the same; and deponent knows that after it so came back upon the hands of the said plaintiffs, the whole was fully completed and finished by the said plaintiffs. This deponent further says, that the laying of the masonry of locks 16 and

17 was done by this deponent, as a sub-contractor, at a sum equal to one dollar per perch, which was less than its actual value.

Response 11th. To the eleventh interrogatory this deponent, answering, says, that he knows that, by the orders and directions of the engineers, the plaintiffs transported from Lewis Sewall's, above the Great Falls, to locks 15 and 16, about three thousand bushels of cement, and that the transportation of the same cost from eight to ten cents per bushel, having to be loaded from the warehouse into the boats, and then to pass through the old locks at the Great Falls to the different landings just below the falls, where all the materials for locks 15 and 16 were landed, and from thence taking by teams across Bear island to the lack sites. The deponent also knows that the plaintiffs transported for the defendants other large quantities of cement to all their locks in the neighborhood of the Great Falls, to wit: locks 15, 16, 17, 18 and 20, but deponent cannot state the number of bushels.

Response 12th. To the twelfth interrogatory this deponent, answering, says, that the plaintiffs built a waste-river for the defendants upon Bear island, in the spring and summer of 1830, and that the cost of the same was somewhere about fourteen hundred dollars.

Response 13th. To thirteenth interrogatory this deponent, answering, says, that he knows that the plaintiffs in the fall of 1829, and winter, spring, and summer of 1830, did one hundred and eighty-eight days work pumping and water-bailing on lock 15, and one hundred and seventy-three days on lock 16, and eighty-seven and a half days on lock 18, and fifty-three days on lock 20, as appears by the memorandums of this deponent, taken at that time, worth one dollar per day; to perform this work the plaintiffs erected two pumps, at an expense of about twelve dollars.

Response 14th. To the fourteenth interrogatory this deponent, answering, says, that Daniel Van Slyke, an engineer of the defendants, requested this deponent and one John Butters to call at his lodgings in Georgetown, where the said Van Slyke drew up a paper of great length, stating that the plaintiffs had under-let or sub-contracted parts of their work at prices greatly below those at which the plaintiffs had taken the same, as this deponent believed, with the intent to defeat the rights of the plaintiffs, in consequence of which, this deponent and the said Butters refused to sign the said paper, although urged by the said Van Slyke to do so and to swear to the same.

Response 15th. To the fifteenth interrogatory this deponent, answering, says, that the mortality along the whole line of the canal, and especially along that part where the plaintiffs were engaged, was such during the month of July, 1830, and, as deponent then understood, during the months of August and September then following, as to cause almost the total abandonment of the work, and numbers of the laborers died daily, some of whom lay dead in the street some hours before interment.

Response 16th. To the sixteenth interrogatory this deponent, answering, says, in addition to what he has already said, that the locks herein before mentioned, were all faithfully executed and fully completed in the best style by the said plaintiffs in the summer of 1830; and he can further state, that the operations and business of the said plaintiffs were, during the whole building of these locks, conducted in the most thorough, persevering, and prudent manner. It may also be proper to state, that deponent has often heard the president of the canal company and their agents state to these plaintiffs, during the progress of the work, that they (the plaintiffs) should be made whole and fully paid the cost of all their work, and damages sus-

tained by want of cement which they, the defendants, acknowledged was caused by the failure of the canal company to furnish cement, and that they should be fully indemnified; and this deponent further says, that all the said locks were eight feet lift each. This deponent further says, that he does not now recollect that he knows or is informed of any thing further that is material either to the plaintiffs or defendants in the above suit or action.

MOSES RANDALL.

Taken, sworn, and subscribed, this 25th day of Febrnary, 1834, *be* the above named deponent, before me,

WM. SISSON,
First Judge of Wayne County Court of Common Pleas.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN, *vs.* THE CHESAPEAKE and OHIO CANAL COMPANY. } *Action in the Circuit Court of the District of Columbia for the County of Washington.*

I, William Sisson, first judge of the court of common pleas, for the county of Wayne, and State of New York, not being of counsel nor attorney for either of the parties mentioned in the above cause, nor in any manner interested in the event thereof, do hereby certify that, on the twenty-fifth day of February, one thousand eight hundred and thirty-four, at my office in the town of Lyons, in the county of Wayne aforesaid, I caused to come before me, Moses Randall, of the town of Clymer, in the county of Chautauque, a witness named and produced to me on the part of the plaintiffs above mentioned, and have taken his deposition upon interrogatories furnished by said plaintiffs, which said interrogatories and the answers or depositions thereto, are hereto prefixed and enclosed. That the said deposition was reduced to writing by me in the presence of said deponent, and was subscribed by him in my presence, after the same had been so reduced to writing; that, previous to the taking thereof, the said deponent was by me carefully examined, cautioned, and sworn, to testify the whole truth; that, at the time of taking the same, the said Moses Randall resided in the town of Clymer, in the county of Chautauque, and State of New York, more than one hundred miles from the city of Washington, the place of trial of the said cause, and that he so residing and being more than 100 miles from the said city of Washington was the reason and cause of taking the said deposition, and that I have not given or served, nor caused to be given or served any notice on the said defendants or their attorney or counsel, of the taking of the said deposition, and to be present thereat, and to put interrogatories, if they should think fit, because neither the said defendants nor any attorney or counsel of theirs to my knowledge was within one hundred miles of the said town of Lyons.

In testimony whereof, I have enclosed the said deposition and interrogatories, and do hereby return the same, under my hand and and seal, with the reasons of taking the same, to the honorable the judges of the circuit court of the District of Columbia for the county of Washington, this twenty-fifth day of February, one thousand eight hundred and thirty-four.

WM. SISSON, [SEAL.]
First Judge of Wayne County Court of Common Pleas.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN, *vs.* The CHESAPEAKE and OHIO CANAL COMPANY. } *Circuit Court of the District of Columbia for the County of Washington.*

Interrogatories to be administered to Benjamin Wright, a witness on the part of Knapp, Ford, Acker, and Chapman, in the above suit or action.

Interrogatory 1st. Are you acquainted with the parties in the above suit?

Interrogatory 2d. Are you in any manner interested in the event of the above suit?

Interrogatory 3d. Were you ever employed by the defendants? If yea, in what capacity and when?

Interrogatory 4th. Were the plaintiffs ever employed to construct any locks for the above named defendants? If yea, when, where, and how many?

Interrogatory 5th. Do you know any thing of the circumstances under which the plaintiffs proposed for and took these locks to build? If yea, state all the particulars in relation to the same?

Interrogatory 6th. Was there or not any estimate of the materials required for each of the said locks made by any person or board of engineers on the part of the defendants? If yea, state the substance of such estimate.

Interrogatory 7th. Was or was not such estimate shown or made known to the persons making proposals for the building of the locks? If yea, what was the object in making such estimate public?

Interrogatory 8th. Were or not any particular number of bushels of cement specified, as required in the construction of a lock? If yea, state the number, the price to be paid for the same, and how and *how* where it was to be delivered, and by whom?

Interrogatory 9th. What was the quality of the cement actually furnished by the defendants for the construction of these locks? How was it furnished, was it furnished in sufficient and what quantities, and at what times?

Interrogatory 10th. Did the plaintiffs suffer any injury from the manner in which the cement was furnished? If yea, to what cause was that loss to be attributed, and what was the amount of such loss?

Interrogatory 11th. Were any and what orders given to the plaintiffs in relation to the completion of the work by the 4th of July, 1830? By whom were such orders given, and what was the effect of such orders upon the arrangements of the plaintiffs?

Interrogatory 12th. Was any and what expense incurred by plaintiffs, in order to comply with such order, and how was such expense incurred?

Interrogatory 13th. Was there or not any committee appointed on the part of the defendants to ascertain and adjust the loss suffered by the plaintiffs, on account of the deficiency in the supply of cement? If yea, of whom did such committee consist? When and where did they meet. State particularly who were present, and what took place at such meeting?

Interrogatory 14th. Was any and what advance made at such time to plaintiffs? By whom was such advance made, and upon what terms. State particularly the negotiation and details in relation thereto.

Interrogatory 15th. Is or is not water-bailing upon canal works a

separate and distinct business from other parts of the work? And is any and what allowance made for it, and how made?

Interrogatory 16th. In what manner did the plaintiffs fulfil their engagements with the defendant, and how was the work done?

Interrogatory 17th. Was there any and what difference between the estimate by the board of engineers, as to the cost of the work upon the canal and the actual cost? What was the cause of this difference, and what representations were made by the president of the canal company at the board of directors, as to the price of labor and provision, and what was the actual price?

Interrogatory 18th. Did Robert Leckie hold any and what office under the defendants? Do you know any thing in relation to any interference on the part of the said Robert with a quantity of cut lock stone belonging to the plaintiffs? State all you know in relation thereto.

Interrogatory 19th. Is it customary or not for persons who build locks upon canals to pay quarry rent?

Interrogatory 20th. Do you know any thing further material to plaintiffs in the above action? Declare the whole truth.

ABRAHAM KNAPP, HENRY ACKER, BENJAMIN FORD, and FREDUS CHAPMAN, *against* The CHESAPEAKE and OHIO CANAL COMPANY. } *Circuit Court of the District of Columbia, for the county Washington.*

STATE OF NEW YORK, *City and County of New York, ss.*

Benjamin Wright, of the city of New York, being duly sworn to testify the whole truth, in relation to the above cause, being duly sworn, deposeth and saith—

In answer to the interrogatories hereunto annexed the said Benjamin Wright deposeth and answereth as follows:

To the first interrogatory he saith: That he is well acquainted with the parties, plaintiffs and defendants, in the above suit.

To the second interrogatory: That he has no interest whatever in the event of the above suit.

To the third interrogatory: That he was employed by the defendants as their engineer in chief, during part of the years 1828, 1829, and 1830, in the construction of the Chesapeake and Ohio canal.

To the fourth interrogatory: That he knows that the plaintiffs constructed for the defendants on the said canal locks, Nos. 5, 6, 8, 15, 16, 17, 18, and 20, and that they built them during the years 1829 and 1830, in which said last year they were completed by the said plaintiffs.

To the fifth interrogatory he saith: That he knows that the plaintiffs proposed for the above locks in the early part of the year 1829. That these locks had been previously let to other persons, and by them abandoned in consequence, as deponent is satisfied, of the difficult and rugged sites of many of them, and their unhealthy location; and, as deponent also believes, from the scarcity of mechanics and laborers, and the high price of provision and food for cattle; and deponent knows that all these difficulties, regarding labor and provision, were very much increased during the whole progress of the construction of the said locks, and that these difficulties were far greater than was ever anticipated or calculated by the engineers;

and that the same could not have been fully estimated until encountered in the course of the construction of the same.

To the sixth interrogatory he saith: That, at the commencement of the labor upon the said canal, an estimate was made, by the engineers employed by the defendants, of the materials that would be required and labor to construct a lock on the same, and that the estimate thus made for an eight feet lift lock, was, as deponent now thinks and believes, about 6,000 superficial feet of cut stone, 3,000 bushels of cement, and other materials in proportion to these rates; and that this estimate applied to the locks generally; and deponent further recollects that Mr. Roberts went into an estimate of the probable cost of the locks constructed by the plaintiffs, and enumerated in his answer to the fourth interrogatory.

To the seventh interrogatory he saith: That he knows that such estimates were shown to persons making proposals, and believes that the estimate made by Mr. Roberts, and referred to in the preceding interrrogatory, was shown to the plaintiffs previously to their making proposals. That the object of showing the estimates to persons proposing, was, to show what, in the opinion of the engineers, would be the probable cost of constructing the work estimated.

To the eighth interrogatory he saith: That, as stated in his answer to the sixth interrogatory, 3,000 bushels of cement were specified as required for each lock of 8 feet lift, and knows that it was expressly agreed between the plaintiffs and defendants that the same should be delivered to the plaintiffs by the defendants at the nearest landing on the Potomac river, (that a vessel could come to at,) to the place where the lock was to be constructed, and that the price was to be forty cents per bushel.

To the ninth interrogatory he saith: That he knows, that in many cases the cement was very bad, in others the same was damaged by having been allowed to get wet before delivery to the plaintiffs. That it was furnished by the defendants in small quantities, and in a very irregular manner, and in many cases not furnished at the times agreed upon between the plaintiffs and defendants; it being expressly understood between the plaintiffs and defendants, that the cement should, at all times, be furnished as it was required for the prosecution of the work.

To the tenth interrogatory he saith: That he knows the plaintiffs were put to serious loss and damage in consequence of the failure of the defendants in supplying cement, as stated in the last interrogatory, the said plaintiffs being obliged to keep their laborers and mechanics in pay when they were actually unemployed, said plaintiffs being in the daily expectation of receiving the said cement; which state of things continued in some instances for a week together, and at others for 2, 4, and 6 days; and deponent further knows, that, in consequence of such failure on the part of the defendants to furnish the cement at the periods agreed upon, the work of the plaintiffs was necessarily protracted to the sickly part of the season, which necessarily caused a great increase in the wages of the mechanics and laborers to induce them to remain during the said period. Deponent further saith, that he knows that the president of the company on many occasions directed the plaintiffs not to dismiss their men, stating, from time to time, that he would have cement furnished, which, in many cases, was not furnished in compliance with his assurances; but deponent cannot say what was the actual loss incurred by the plaintiffs, although, as above stated, he believes it to have been very serious.

To the eleventh interrogatory he saith: That he knows that the president of the company and the board of directors did press the plaintiffs to complete their said work with the intention of having the water let into the said canal by the 4th of July, 1830, and that orders to that effect were repeatedly given by the president of the company to the plaintiffs, with directions to increase their force and hurry on the work, and *deponent knows* that such directions were *publicly known* on the whole line of the canal, and the effect of such efforts to hurry on the work, and to increase the force, as above stated, was, to make the mechanics and laborers employed demand higher wages, which, as deponent believes, were demanded from and paid by the plaintiffs accordingly.

To the twelfth interrogatory he saith: That extra expenses, in deponent's opinion, were necessarily incurred by the plaintiffs, in order to comply with the said order; but to what amount deponent cannot answer, although he has no doubt it was large, from the circumstance that an extra number of men were employed at extra wages, and frequently, (as stated in the answer to the 10th interrogatory,) paid when actually idle, in consequence of the failure, as stated in the answer to said interrogatory, of the defendants to furnish cement, it not being in the power of the plaintiffs to collect the men together, if they had dismissed them from time to time when they were unemployed.

To the thirteenth interrogatory he saith: That he knows that there was a committee appointed by the board of directors of the company to examine into the loss and damage sustained by the plaintiffs, in consequence of the failure on the part of the defendants to supply the cement as aforesaid at the proper times, and to investigate certain other claims of the plaintiffs, against the defendants, the committee consisted of Charles F. Mercer, Walter Smith, and Peter Lenox, and they met at the counting room of the said Walter, in Georgetown, in the District of Columbia, some time, as nearly as deponent can recollect, in the month of May, 1830, and that Clement Smith, the treasurer of the said company, and deponent were present at the said meeting. Deponent further says, that, at the said meeting, it was understood and agreed that any loss incurred by the plaintiffs, growing out of the act or acts of the defendants or their agents, should be reimbursed to the said plaintiffs, and justice done them; that, at the said meeting, it was admitted on behalf of the company, that they had failed in supplying the cement according to their agreement, and it was understood that the principles of the indemnification for the losses thus sustained by the plaintiffs, together with any other just claim of the plaintiffs, against the said defendants, should be settled immediately after the next meeting of the board of directors, which were to be chosen the first Monday of June, then next ensuing. Deponent further saith, that, at such meetings, it was further agreed that an advance should be made to the plaintiffs by the defendants of a large sum of money, but to what amount deponent cannot recollect over and above the amount due to the plaintiffs, as appeared by the certificates for work done, which were given by the engineers of the company to the plaintiffs.

To the fourteenth interrogatory he saith: That an agreement to advance a certain sum of money was made at the said meeting, but what amount deponent cannot state, and deponent further saith, that he understood such advance was to be made in part liquidation of the claim of the plaintiffs against the defendants for losses sustained in consequence of the non-com-

pliance on the part of the defendants, with their part of the agreement between them and the said plaintiffs.

To the fifteenth interrogatory he saith: That in bailing water from lock-pits, is, in all cases upon public works, an extra charge, and to be paid according to the appraisal or estimate of the engineer, unless provision is expressly made for such work in the contract between the parties.

To the sixteenth interrogatory he saith: That he knows the plaintiffs were industrious thoroughgoing men, and, as such, carried the work through to its final completion; and deponent believes that certificates upon the completion of the work were given by the engineers of the company to the plaintiffs, as is usual in such cases.

To the seventeenth interrogatory he saith: That there was a great difference between the original estimate of the engineers and the actual cost of the work, as well of the materials and labor employed in the construction of the same. Deponent has often heard the president of the company represent labour and materials in the vicinity of the neighborhood, where the canal was to be constructed, to be much cheaper than was actually found to be case, and has no doubt but that such representations by the president of the company had great influence in misleading the parties in making their estimate of the probable cost of the work.

To the eighteenth interrogatory he saith: That the said Robert Leckie was in the employ of the defendants during the years 1829 and 1830, in the capacity of inspector of stone work and masonry, and deponent has understood and believes that said Leckie, in many cases, interfered with, and, in some instances, broke the cut lock stones belonging to the plaintiffs.

To the nineteenth interrogatory he saith: That it is not customary, and, in general, it is understood that the quarry rent is to be paid by the company unless there be an express stipulation to the contrary.

To the twentieth interrogatory he saith: That he knows nothing further in relation to the matters in controversy in this cause, than is mentioned in the answers to the above interrogatories, and deponent, in conclusion, states generally, that he knows that the plaintiffs sustained great loss in consequence of the failure on the part of the defendants to comply with their part of the agreement with the said plaintiffs, as is now particularly herein before stated.

BENJAMIN WRIGHT.

Sworn this 28th December, 1830, before me,
JOHN T. IRVING,
First Judge of the Court of Common Pleas,
for the city and county of New York.

STATE OF NEW YORK, *city and county of New York, ss.*

I, John T. Irving, first judge of the court of common pleas, for the city and county of New York, do hereby certify, that, on the twenty-eighth day of December, in the year of our Lord one thousand eight hundred and thirty three, between the hours of six and nine in the afternoon, of that day, at my chamber in the city of New York, aforesaid, personally came and appeared before me Benjamin Wright, of the city of New York, a witness for Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, in a certain action on the case wherein they are plaintiffs, and the Chesapeake and Ohio Canal Company, are defendants, now pending in the circuit court

of the District of Columbia, for the county of Washington, and the said witness being by me then carefully examined and cautioned and sworn to testify the whole truth thereupon, upon his said oath, made the aforegoing deposition, which deposition was taken in said action before me, and was thereupon reduced to writing by me, and being carefully read over to the said witness by me, was, thereupon, subscribed by the said witness before me as his deposition in the premises.

I further certify that I am not of counsel or attorney to any, or either of the parties, nor interested in the event of the said action or cause. That the reason of taking the said deposition is, that the said witness lives in the city of New York aforesaid, at a greater distance from the place of trial than one hundred miles.

That no notification from me to the adverse parties, the defendants, to be present at the taking of said deposition, and put cross interrogatories, was made out and served upon them, because neither of the said defendants, or any attorney, or agent of theirs, known to me, were within one hundred miles of the place of taking said deposition.

In testimony whereof, I have hereunto set my hand and seal, on this thirtieth day of December, in the year first before written in this certificate.

[SEAL.] JOHN T. IRVING,
First Judge of the Court of Common Pleas, for the city and county of New York.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN,
vs.
The CHESAPEAKE and OHIO CANAL COMPANY.

Action in the Circuit Court of the District of Columbia, for the County of Washington.

Interrogatories to be put to Nathan S. Roberts, on the part of Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, in the above suit or action:

Interrogatory 1st. Do you know the several parties, plaintiffs and defendants above named, and are you in any manner interested in the above suit or action, or in the event thereof?

Interrogatory 2d. Did, or did not, Knapp, Ford, Acker, and Chapman, at any and at what time construct any lock, or locks, for the above named defendants? If yea, how many? Was you in the employment of the said defendants? If yea, in what character or capacity?

Interrogatory 3d. Was there, or was there not, any estimate of the quantity and price of the materials required for the construction of each of the said locks, made by any person, or board of engineers, at the instance or procurement of the defendants? If yea, state the substance of such estimates, to whom they were delivered, and all your knowledge in relation thereto?

Interrogatory 4th. Was, or was not, such estimates exhibited to, or made known, to the parties making proposals for the building of the locks? If yea, for what purpose was such estimate made public?

Interrogatory 5th. What were the location, or sites of the locks, built by the above named plaintiffs, and what were the foundations or bottoms? State your knowledge thereto, and of the favorableness, or unfavorableness, of the same.

Interrogatory 6th. What was the actual expense, or cost, per foot lift, in constructing these locks, and the cost of excavating the pit for the same? the embanking, puddling, and building the protection walls, as well as the building, or making roads upon the side of the mountain, to procure earth for embanking and puddling?

Interrogatory 7th. Was there, or was there not, a particular number of bushels of cement stated in the estimate, as necessary for the construction of a lock? If yea, state the number, the price to be paid for the same, how and where it was to be delivered, and by whom?

Interrogatory 8th. What was the quality of the cement furnished by the defendants for the construction of these locks, and was it such as was contemplated in the estimate?

Interrogatory 9th. Did the plaintiffs suffer any inconvenience, and were they subject to any, and what loss, from the manner in which the cement was furnished by the defendants? If yea, to what cause was the loss to be attributed, and how did it affect the plaintiffs?

Interrogatory 10th. Were any, and what orders, given to the plaintiffs in relation to the completion of the work by the 4th day of July, 1830; by whom were such orders given, and what was the effect of such orders upon the arrangements of the plaintiffs; was any increased expense incurred by the plaintiffs, and to what amount, in order to comply with such orders; and in what manner was such expense incurred?

Interrogatory 11th. Is, or is not, water bailing upon canal works, a separate and distinct business from other parts of the work; and is any, and what allowance, made for it, and by whom estimated or valued?

Interrogatory 12th. Were any, and what alterations, made in the plan of the said locks during the progress of the work; in what stage of the work were such alterations made; and by whom are the expenses of such alterations to be borne?

Interrogatory 13th. In what manner did the plaintiffs conduct their business, or work, whilst engaged in the construction of these locks, and what was the character of the workmanship upon the locks referred to?

Interrogatory 14th. Was there any, and what difference, between the the estimate of the board of engineers exhibited to the plaintiffs, as the basis of their undertaking, to construct these locks, and the actual cost; what was the cause of that difference, and representations were made by the defendants as to the price of labour and subsistence, and what was the actual cost thereof?

Interrogatory 15th. Is it usual, or customary, or not, for persons who build locks upon canals, to pay quarry rent?

Interrogatory 16th. To whom should be charged the excess in the quantity of cut stone used in the construction of these locks, over and above the estimate of the engineers; and how, and what rate, should it be valued, or estimated, in reference to the locks built by the plaintiffs?

Interrogatory 17th. To whom should be charged the expense of———, hauling, and putting into the locks, the excess in the quantity of cement and constructing these locks, over and above the estimate of the engineers; and at what rate should it be valued or estimated?

Interrogatory 18th. What is the cost of painting the gates of these locks?

Interrogatory 19th. Were the foundations, or bottoms, of any, and which of the locks, built by plaintiffs, more or less expensive than was cal-

culated in the estimate of the engineers? State particularly your knowledge relative to estimated cost of each of the said foundations, as well as the actual cost thereof.

Interrogatory 20th. Is it customary upon, canal work, to charge the ditching and draining lock pits, as extra work? If yea, at what price should it be estimated, or valued, in reference to the work done by the plaintiffs?

Interrogatory 21st. Do you know, or are you informed of any thing further, which is material to plaintiffs, or defendants, in the above action? Declare the whole truth.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN, *vs.* The CHESAPEAKE and OHIO CANAL COMPANY. } *Action in the Circuit Court of the District of Columbia. for the county of Washington.*

STATE OF NEW YORK, *county of Madison, ss.*

Nathan S. Roberts, of the town of Lenox, in the county of Madison, in the State of New York, being duly sworn, deposeth and saith, that I was well acquainted with Abram Knapp, Benjamin Ford, and Fredus Chapman, during the time they were engaged as contractors on the Chesapeake and Ohio canal, and since; and that I am in no way, or manner, interested in the suit, or action, between them and the said company.

To the second interrogatory annexed this deponent says, that I do know that Knapp, Ford, and Chapman, the above named plaintiffs, in the years 1829 and 1830, did construct eight locks on the Chesapeake and Ohio canal for the said defendants, viz. locks Nos. 5, 6, 8, 15, 16, 17, 18 and 20, on the eastern, or first division, of said canal, and that, during the whole of said time, I was employed by said defendants, as a member of the board of engineers, and in superintending the various parts of said canal and locks above named.

To the third interrogatory annexed this deponent says, that there were estimates of the quantities and prices of materials made by two members of the board of engineers, viz. Judge Wright and Doctor Martineau, a few months before my arrival, in the year 1828; but said estimate was found to be very far below the cost of materials and of labour, and, on that account, the first contractors were under the necessity of abandoning the above locks, during the first year. And Judge Wright, the engineer in chief, and this deponent, a member of the said board of engineers, were authorized by the directors, to revise the estimated cost of constructing said locks, as circumstances and prices there appeared, in order to let them to other contractors at such prices as would be a fair and just compensation for constructing them. This, however, through press of business, was deferred by Judge Wright so long, that I was advised to undertake the task alone, Doctor Martineau being prevented by sickness to render any assiatance whatever. And having taken the best means in my power to ascertain, from my own knowledge, prices of materials and of mechanical and common labour, on that part of the canal, which the short time I had been there would enable me to obtain, I proceeded to make out a revised estimate of the cost of materials and labour, in constructing said locks, which estimate was delivered to the company by this deponent, and was used as the basis for letting the locks to the above plaintiffs. But the unusual magnitude of the difficulties to be overcome in the vicinity of the High Falls of the Potomac, where

locks Nos. 15, 16, 17, 18 and 20, were constructed, made it extremely difficult and impossible to foresee, and estimate with any tolerable degree of accuracy, the details of all the expenses that afterwards occurred. Among these, were the extreme difficulty and great expense of making the necessary roads to said locks, which seemed almost inaccessible, in order to deliver the vast amount of materials necessary for their construction, and the great expense of preparing the lock pits or sites among crags and crevices of rocks, and the great amount of masonry necessary in building up under the foundation of said locks, the bottoms of which, in the estimates, were supposed to be built of timber and plank, and the great quantities of cement used in said foundations and throughout the locks, owing to the meagre quality of the cement, and the roughness of the foundation, and the irregular shaped granite rocks, which were necessarily used for the foundations and the backing of the lock, and the walls thereof.

The revised estimate presented by me, of the locks above mentioned, amounted to above $1,100 per foot lift, but by the minutes kept by Daniel Van Slyke, esquire, the resident engineer, I have since been convinced, was between $400 and $500 below, or less, than the actual cost, including the foundations and the extra quantity of cement, painting the gates, &c. &c.

The extra quantities of masonry and cut stone and cement, used in the foundation and entire construction of said locks, can be given in detail, no doubt, by the assistant engineer, Theophilus Williams, esquire, then employed for that purpose by said defendants.

To the fourth interrogatory annexed, this deponent says, that it has been customary to make known the estimates to persons making proposals, of the quantities of materials, of all kinds, necessarily used in the construction of a lock, to enable them to calculate for themselves upon the cost of each, and to offer their proposals understandingly in that respect, as contractors; and for these reasons, original estimated quantities were shown and made known to the plaintiffs by this deponent.

To the fifth interrogatory this deponent says, that the location of the locks built by the plaintiffs, were all supposed in the estimates to have a timber and plank foundation, or a smooth rock bottom, which was supposed to be less expensive, but in each lock (except the eighth) the masonry below the foundation was much more expensive than a timber and plank bottom. This interrogatory has been answered partly in the third interrogatory with regard to the extreme inaccessibility of the lock sites, and the amount of cement and masonry under the foundations of each, by referring to the assistant engineer of that residency.

To the sixth interrogatory this deponent says, that this is in part answered in the third interrogatory. But, from the best information I have been able to obtain from the notes of the resident and assistant engineer, and from my own subsequent observations, I am fully of the opinion, that the locks Nos. 8, 15, 16, 17, 18 and 20, cost, on an average, taking every inconvenience into the account appertaining thereto, but very little short of, or less, than $1,500 per foot lift. Locks No. 5 and No. 6, were built of face stone from Acquia creek, (in situations where granite for the face stone were expected, but could not be obtained) the transportation of which, considerably increased the expense of said locks; for cost of the same and for protecting walls, reference can be had to the assistant and resident engineer, and to other engineers having knowledge of the same. The excavation of the lock pits, and the landing up of the locks, and puddling around the walls of each, were separate parts of the work.

To the seventh annexed interrogatory this deponent says, that the quantity of cement for a lock of eight feet lift, was stated in the estimates at 3000 bushels, or two and a half bushels to a perch, of twenty-five cubic feet of masonry. The price to contractors was not to exceed forty cents a bushel, and the whole of the cement for each and every lock, was to be *furnished and delivered* at each lock sites, by the said company, at the above cost of forty cents a bushel, and that no greater price per bushel was to be charged to said plaintiffs.

To the eighth interrogatory this deponent says, that the cement furnished by the defendants for the construction of these locks, was of various qualities; that from Shepherdstown was the best, and approached nearest to the required quality, but that from Tuscarora, of which considerable quantities were used, was so meagre, that it would not fairly bear more than one-fourth sand, and was often used without any sand whatever, by the particular direction of the superintending engineer. The New York cement, which was considered as the standard, bears at least one-half sand and sometimes more. This difference in the quality of the cement, together with the roughness of the backing stone, accounts, very rationally, for a great part of the increased quantity charged to the plaintiffs.

To the ninth interrogatory this deponent answers and says, that it was well understood that great hindrance occurred to these contractors, by the irregularity in delivering the cement, but to what amount I could not positively calculate or state, one circumstance was evident, that the hindrance suffered by these contractors in the spring of the year for the want of cement, compelled them to continue their force at great expense, and to incur the hazard and expense of continuing at their locks through the sickly months of July and August. The quantities of cement furnished were sufficient to complete the locks and the foundation walls, the account of which was kept by the company, or their agents, or clerks, but the amount of loss to the contractors, by hindrance, in waiting for cement, could be both answered by reference to the resident, or assistant engineers, as mentioned in the answer to the third interrogatory.

To the tenth interrogatory this deponent answers, that, at the time alluded to, I was engaged with Mr. Knight, as a joint agent, commissioned by the chancellor of Maryland, in behalf of the canal and railroad companies, to ascertain the practicability of constructing those two great works along the narrow below Harper's Ferry, and being confined to that duty, had but a very limited knowledge of the inquiry contained in the tenth interrogatory.

To the eleventh interrogatory this deponent says, that water bailing and draining of lock pits, unless expressly provided for in the contract, are considered as extra expense, and are usually paid for at the estimate of the engineer having charge of the same, acting under the authority of the company for the purpose.

To the twelfth interrogatory this deponent answers, that, in every contract relating to the construction of locks, or other parts of the canal, a reserve is usually made, giving the engineer the right of improving, amending, or altering the plans, locations, or constructions, of any locks or other appendages of a canal, as emergency or necessity may require and justify, and the contractor is also bound to submit to such alterations, and the expense arising out of such alteration, is estimated by the engineer and paid for by the company, and that several alterations in the culverts, and in other parts of said lock was made, is known generally by this deponent, but to

what amount I am not able to state, but this might be referred, as in the last part of the answer, to the third interrogatory.

To the thirteenth interrogatory this deponent answers and says, that the plaintiffs, while conducting the operations of this most difficult contract, evinced a spirit of industry, perseverance, and skill in application, at all times, to a degree seldom equalled, and overcome obstacles not commonly met with, even on the most difficult lines of canals, and that their progress was steady, and conducted with good judgment, and with a strong force, through the whole of their work on said locks, and that all parts of said locks were faithfully and substantially built, finished, and completed, in a workmanlike manner, to the acceptance of the engineers having the inspection thereof.

To the fourteenth interrogatory this deponent says, that, in referring to the difference between the estimated cost and the actual cost, of constructing these locks, and other works on that part of the Chesapeake and Ohio canal, there was several causes of difference. One principle cause was an impression, that at first prevailed with the engineers, with regard to the prices of labour and subsistence, both of which, they were led to believe, were uncommonly plentiful and cheap, but, in the progress of the work, it was soon experienced, that labour was at from fifty to seventy-five per cent. higher than had been represented, and that provisions and lumber were from fifteen to twenty-five per cent. higher, than those articles had been included in the original estimates, and to these enhanced prices must be added the extreme sickness of the line of the canal near the High Falls where those locks were built, which prevailed to such a degree, as to cause great embarrassment and loss to the contractors, from July to October, in each year, and put almost an entire stop to their operations, by the terror among the hands, their number at those times became very much reduced, and the wages of those retained was considerably raised, of necessity, in order to keep them on the work. As this deponent was engaged in making the original estimates, it may be proper to state, that, from information derived from reports in the hands of said company, labor was estimated at $8 00 per month, and other things equally cheap and abundant; but in the course of application, it was found from the beginning, that laborers were scarce and obtained with difficulty, even at the above advanced prices.

To the fifteenth interrogatory this deponent says, that it has not been usual for contractors to pay quarry rent, but when such rent has been charged for the use of a quarry, the cost of the stone in the quarry has been paid for by the company or State, unless a special agreement, or contract to the contrary, has been made.

To the sixteenth interrogatory this deponent says, that the quantity of cut stone in a lock on the Chesapeake and Ohio canal, was more than was at first calculated, by reason of extending the side culverts to near the centre of the lock chamber. It is evident that this arrangement would add to the quantity of face, or cut stone, and of course, increase the expense per foot lift. But as the quantity of perches in the lock is reduced by lengthening the culvert, probably an adjustment between the addition to the cut stone and the reduction from the first, or estimated number of perches, contained in a lock, appears to the deponent to be required in balancing these items between the parties.

To the seventeenth interrogatory this deponent says, that the excess of cement *actually* used, over and above the quantity estimated, is probably accounted for, mostly in the great quantity of mortar and granite used in

the foundations and bottom of each lock, and from the cavities to be filled, in the bottom of said foundations, and in granting the very irregular and pointed granite backing without any natural beds, which were necessarily used in constructing the foundations, and in the backing of said locks. And from the knowledge of this deponent, it is my belief, that the plaintiffs should be charged for two and a half bushels of cement, at forty cents a bushel, to each perch of masonry in a lock, as stated in the estimates, and in the masonry below the foundations, and no more; and that whatever quantity, over and above two and a half bushels to a perch, may have been charged to the plaintiffs, or over and above forty cents a bushel for that quantity, the excess in both cases should not be borne by the plaintiffs, and that no allowance should be made to the plaintiffs for using the excess of cement which may, or may not, have been used by them, as it is reasonable to believe that considerable loss was sustained by hauling, and loading, and unloading, and by some risk and irregularity of the navigation, and the returns made by boatmen; as this deponent has been informed, that loads consigned to one contractor, by mistake, may have been delivered to another.

To the eighteenth interrogatory this deponent says, that the painting of the gates of a lock will cost more or less, according to the number of coats; for two coats, well put on, from thirty-five to forty dollars has been paid on other canals.

To the nineteenth interrogatory this deponent says, that in the original estimates, the foundations were considered as of timber and plank, and it was supposed that several of the locks would be built on rock, and perhaps the timber and plank foundation, in part omitted. But in all cases, where any foundation on rock was more expensive than that contemplated in the estimates, as originally calculated, the actual difference would be allowed to the contractor, unless some express agreement was made to the contrary, of which this deponent has no recollection or knowledge. To ascertain the expense of each foundation, below the bottom of each of the locks, reference should be had to the books of the residency and assistant engineer, as referred to in my answer to the third interrogatory.

To the twentieth interrogatory, in answer, this deponent says, that this interrogatory is embraced and answered in the eleventh answer.

To the twenty-first interrogatory, in answer, this deponent says, that the above answers are considered as containing all the material knowledge which relates to the above interrogatories, which at this time occur to my recollection. But it is proper to add, that the situation of locks No. 15, 16, 17, 18, and 20, situated as they are, among the wild and romantic cliffs, and chasms of the rocks forming the margin of the High Falls of the Potomac, and along the contiguous streams and channels at the head of Bear Island, the sites of all these locks thus situated, appear almost inaccessible, by land or water, and that, in these situations, such vast quantities of ponderous materials, as are contained in these five locks, of such magnitude as those on the Chesapeake and Ohio canal, should be there safely delivered; the lock pits formed among craggy rocks, and the masonry and gates constructed, and the embankment of the locks which was taken at great expense from among the cliffs and ravines between these rocks, and when it is known that all these difficulties have been surmounted, and that all these locks have been completed in the very best and most substantial manner, together with all the protecting walls, and embankments of every description, particularly required by the engineer, it must be admitted by all competent judges, that

the expense of constructing them, as the same is stated in the answer to the sixth interrogatory, would be thought much below the actual cost of their construction, which would undoubtedly have been much increased in almost any other hands, and it is but justice to say of these plaintiffs, as contractors, that, in good faith, they have constructed these locks, and have overcome more and greater obstacles, in the great undertaking, than have fell to the lot of any other contractors that have, as yet, come under my knowledge on any canal, or other public work.

NATHAN S. ROBERTS.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER and FREDUS CHAPMAN, *against* The CHESAPEAKE and OHIO CANAL COMPANY. } *Action in the Circuit Court of the District of Columbia, for the county of Washington.*

I, James ———, a judge of the court of common pleas, for the county of Madison, in the State of New York, (being a court of record) not being counsel or attorney for either of the parties mentioned in the above cause, nor in any manner interested in the event thereof, do hereby certify, that, on this eighth day of July, in the year of our Lord one thousand eight hundred and thirty three, at my office, in the town of Nelson, county of Madison aforesaid, I caused to come before me Nathan S. Roberts, a witness named and produced to me on the parte of the plaintiffs, in the above cause, and have taken his deposition upon interrogatories furnished by the said plaintiffs, which said interrogatories, and his answers or depositions thereto, are hereto annexed and enclosed.

That the said deposition was reduced to writing by the said deponent, in my pres*ants*, and was subscribed by him in my pres*ants*. That *previs* to the taking thereof, the said deponent was by me carefully examined, caus*h*ened and sworn, to testify the whole *trauth*. That, at the time of taking the same, the said Nathan S. Roberts resided in the town of Lenox, in the county of Madison and State of New Yorke, more than one hundred mil*d*es from the city of Washington, the place of trial of the said cause, and that his so residing and being more than one hundred miles from the said city of Washington, was the reason and cause of the taking the said deposition. And that I have not given, or served, or caused to be given, or served, any notice on the said defendants, in the above cause, or their attorney or counsel, of the taking of the said deposition, or to be present thereat, and put interrogatories if they should think fit, because neither the said defendants or *there* attorney in the above cause, or their attorney, or counsel, were within one hundred mi*lds* of the said town of Nelson.

In testimony whereof I have enclosed the said deposition and interrog-, and do hereby return the same, under my hand and seal, with the reasons of taking the same, to the honorable the judges of the circuit court of the District of Columbia, for the county of Washington, this eighth day of July, in the year of our Lord one thousand eight hundred and thirty-three.

[SEAL.]

A Judge of the Court of Common Pleas of the county of Madison, State of New York.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN, *vs.* The CHESAPEAKE and OHIO CANAL COMPANY. } *Action in the Circuit Court of the District of Columbia, for the county of Washington.*

Interrogatories to Henry A. Packard and John O. Stearns, on the part of Knapp, Ford, Acker, and Chapman, in the above action.

Interrogatory 1st. Do you know the several parties above named, and are you in any manner interested in the above suit or action?

Interrogatory 2d. Are you, or not, mechanics, acquainted with stone-work and masonry, in building and constructing canal locks?

Interrogatory 3d. Do you, or not, know that Knapp, Ford, Acker, and Chapman, built and constructed a number of locks on the Chesapeake and Ohio canal, for the Chesapeake and Ohio Canal Company? and was, or was not, the number of locks eight? what was the actual cost per foot lift of constructing said locks? at what time were said locks built?

Interrogatory 4th. Did you, or not, lay and do the mason work of one of said locks, for the said Knapp, Ford, Acker, and Chapman, upon the said Chesapeake and Ohio canal? what was the price per perch you received of said Knapp, Ford, Acker, and Chapman, for laying the mason work of said lock?

Interrogatory 5th. Do you, or not, know something of a conversation which passed between John P. Ingle, clerk of the Chesapeake and Ohio Canal Company, and Benjamin Ford, and Fredus Chapman? what did that conversation relate to? and what was that conversation? and what time or date did the conversation occur?

Interrogatory 6th. Did you, or not, meet with delay and hindrance, at sundry times, whilst building the mason work of said lock? and what was the cause of said delay or hindrance?

Interrogatory 7th. What was the quality of the cement used in the masonry of the locks built upon the said canal by Knapp, Ford, Acker, and Chapman? what is the difference in the value between the cement known as the New York cement, and that used in the work and locks constructed by Knapp, Ford, Acker, and Chapman, upon the Chesapeake and Ohio canal?

Interrogatory 8th. Do you know any thing further, material to plaintiffs or defendants, in the above action? Declare the whole truth.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN, *vs.* The CHESAPEAKE and OHIO CANAL COMPANY. } *Action in the Circuit Court of the District of Columbia for the county of Washington.*

John O. Slearn, a witness for the plaintiffs in the above action, being sworn, deposeth and saith, in answer to the first interrogatory: I am acquainted with the parties above named, and I am not interested in the above suit or action.

To the second interrogatory: I am a mechanic; I am acquainted with stone work and masonry, and in building and constructing canal locks.

To the third interrogatory: I do know that Knapp, Ford, Acker, and Chapman, built and constructed a number of locks upon the Chesapeake and Ohio canal, for the Chesapeake and Ohio Canal Company. I believe that the number of locks constructed and built was eight. I think that fifteen

hundred dollars would be about a fair average per foot lift. The greatest part of the work was done in the spring of the year one thousand eight hundred and thirty, and the whole completed in the same year.

To the fourth interrogatory: Henry A. Packard and myself built one of the said locks—that is, did the mason work—for Knapp, Ford, Acker, and Chapman, upon said Chesapeake and Ohio canal, for which we received one dollar per perch.

To the fifth interrogatory: I was present at a conversation which took place between John P. Ingle, clerk of the Chesapeake and Ohio Canal Company, and Benjamin Ford and Fredus Chapman, in relation to a certain lot of lock stone, quarried and cut by Joseph W. Maynard upon the farm of Mrs. Broome, in Montgomery county, Maryland; in which conversation I heard Ford ask Ingle what was to be done with those stone of Maynard's which had been attached by Broome? To which Ingle replied, that the company had been at Rockville, and found that their bill of sale for the stone of Maynard's had not been recorded, and consequently was good for nothing; and Ingle furthermore told Ford, that the company could not hold the stone, as their title was not legal; and told Ford and Chapman that they must take their own course, relative to the purchase of the stone, and do the best they could. I think that this conversation took place at the last of March, or beginning of April, A. D. 1830.

To the sixth interrogatory: We did meet with delay and hindrance, at sundry times, whilst building the mason work of said lock, in consequence of a want of a sufficient supply of cement.

To the seventh interrogatory: The quality of the cement used in the masonry of the locks built upon said canal by Knapp, Ford, Acker, and Chapman, was not good. I should think that the cement used by them was at least one-third less in value to the New York cement.

To the eighth interrogatory: We were ordered by Daniel Van Slyke, one of the engineers of the Chesapeake and Ohio Canal Company, to use more cement, on account of *its* being bad; with some of the cement he told us to use four parts to one of sand, and to some three parts to one, and some two one; and there was some of it that he would not let use at all, in consequence of its bad quality, and sent off and got other; and further this deponent saith not.

J. O. STERNS.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN. *vs.* The CHESAPEAKE and OHIO CANAL COMPANY. } *Action in the Circuit Court of the District of Columbia for the County of Washington.*

Henry A. Packard, a witness for the plaintiffs, being sworn, deposeth and saith, in answer to the first interrogatory: I do know the several parties above named, and I am not interested in the above suit or action.

To the second interrogatory: I am a mechanic, and I am acquainted with stone work and masonry, and building and constructing canal locks. I have worked upwards of twelve years at constructing and building canal locks.

To the third interrogatory: I do know that Knapp, Ford, Acker, and Chapman, built and constructed a number of locks upon the Chesapeake and Ohio canal, for the Chesapeake and Ohio Canal Company; the number of

locks was eight. I should say the work at those locks was worth fifteen hundred dollars per foot lift. The locks were built in the year one thousand eight hundred and thirty. By fifteen hundred per foot lift, I mean exclusive of pits and embankment.

To the fourth: Sterns and I did do the mason work of one of those locks, viz. Lock No. 8, for Knapp, Ford, Acker, and Chapman, upon said Chesapeake and Ohio canal; and we received one dollar per perch for laying the stone, all the materials being furnished to us by Knapp, Ford, Acker, and Chapman.

To the fifth: I was present at a conversation between John P. Ingle, clerk of the Chesapeake and Ohio Canal Company, and Benjamin Ford and Fredus Chapman. I have read over the testimony of John O. Sterns, a witness in this cause, who was present at the conversation above spoken of, and agree with him in every particular.

To the sixth interrogatory: We did meet with delay and hindrance, at sundry times, whilst building the mason work of said lock. The cause of delay was the want of cement.

To the seventh: The cement used by Knapp, Ford, Acker, and Chapman, in the masonry of said locks, was very inferior. Mr. Vanslack, the engineer, told us to use as much again of the cement as is used where the article is good; and some of the cement was so inferior that he ordered to use cement altogether, neither lime nor sand with it. I have used the New York cement, and am of opinion that the cement used in the building of the locks of the Chesapeake and Ohio canal, is at least one-third less in value to the cement of New York.

To the eighth: To lay the stone work, furnished as we were with all the materials, was worth one dollar and a quarter per perch; we lost money at one dollar, and further this deponent saith not.

HENRY A. PACKARD.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN.
vs.
The CHESAPEAKE and OHIO CANAL COMPANY.

Action in the Circuit Court of the District of Columbia, for the county of Washington.

I, John Swift, esquire, mayor of the city of Philadelphia, not being counsel or attorney for either of the parties mentioned in the above cause, nor in any manner interested in the event of said cause, do hereby certify, that, on the sixteenth day of April, 1833, at my office, in the city of Philadelphia, I caused to come before me John O. Stearns and Henry A. Packard, of the city of Philadelphia, witnesses named and produced to me, on the part of the plaintiffs above mentioned, and have taken their depositions upon interrogatories, furnished by plaintiffs, which said interrogatories, and the answers or depositions thereto are hereto prefixed and enclosed; that the said depositions was reduced to writing by me in the presence of the said deponents, and was subscribed by them in my presence, after the same had so been reduced to writing; that, previous to the taking thereof, the said deponents was by me carefully examined, cautioned, and sworn, to testify the whole truth; that at the time of taking the same, John O. Stearns and Henry A. Packard resided in the city of Philadelphia, more than one hundred miles from the city of Washington, the place of trial of said cause, and this his so residing, and being more than one hundred miles from the

said city of Washington, was the reason and cause of taking the said deposition; and that I have not given or served any notice on the said defendants, or their attorney or counsel, of the taking of the said deposition, or to be present thereat, and to put interrogatories, if *he* should think because neither the said defendant, nor any attorney or counsel of theirs, to my knowledge, was within one hundred miles of the city of Philadelphia.

In testimony whereof, I have enclosed the said depositions and interrogatories, and do hereby return the same under my hand and seal, with the reasons of taking the same, to the honorable the judges of the circuit court of the District of Columbia, for the county of Washington, this sixteenth day of April, one thousand eight hundred and thirty-three.

In testimony whereof, I, the said mayor, of the city of Philadelphia, [L. S.] have hereunto set my hand and caused the corporate seal of said city, the day and year above written.

JNO. SWIFT, *Mayor.*

Whereupon, the said defendants, by their counsel aforesaid, filed in court here the following papers, to wit:

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN, *vs.* The CHESAPEAKE and OHIO CANAL COMPANY. } *Circuit Court of the District of Columbia, for the county of Washington.*

Interrogatories on the part of the defendants in the above cause, submitted on the cross-examination of Benjamin Wright, of the city of New York, a witness heretofore examined by the plaintiffs, and whose depositions were filed in said court, in the said cause, on the 3d day of March, in the year 1834.

Interrogatory 1st. Did you know all the above named plaintiffs at the time you were the chief engineer of the Chesapeake and Ohio Canal Company? were they all employed in the construction of the locks on the said canal, numbered 5, 6, 8, 15, 16, 17, 18, and 20? If nay, state which of them were so employed and which were not.

Interrogatory 2d. Were the plaintiffs apprised of the fact that the said locks had been previously let to other persons and abandoned by them, and the reason why they were abandoned at the time they made their proposals to take a contract for the construction of the same on themselves? Were such proposals in writing, and did the negotiation result in written contracts between the plaintiffs and the defendants for the construction of said locks, in which the prices of construction are specified, and the mode of estimating the value of any extra work agreed upon?

Interrogatory 3d. For what purpose were estimates of the cost of constructing the locks on the canal made by the engineer of the company? Is not the paper shown you and marked A, (copied in page ,) signed by Benjamin Wright, Nathan S. Roberts, and John Martineau, the same paper to which you allude in your answer to plaintiff's sixth interrogatory, as being the estimate of the cost of locks prepared by Mr. Roberts, and was it not prepared for the private use of the defendants?

Interrogatory 4th. Do you know of your own knowledge that the paper, marked A, (copied in page ,) and referred to in the last interrogatory, was shown to the contractors previous to their offering proposals and con-

tracting to construct the said locks? If yea, at whose instance and by what authority was it shown to them?

Interrogatory 5th. What means of knowledge have you that it was agreed especially between plaintiffs and defendants, that cement should be delivered to the plaintiffs by the defendants at the nearest landing on the Potomac river, (that a vessel could come to at,) to the place where the lock was to be constructed? Was such condition contained in the printed specification exhibited to the contractors and accepted by them when they proposed for the work, or was it the subject of a subsequent special contract? If so, was such a contract in writing, and at what date was it made?

Interrogatory 6th. Was there not an abundance of materials for the manufacture of hydraulic cement at or near Shepherdstown, and east thereof, on the Potomac river, of a quality fit for the construction of the said locks?

Interrogatory 7th. Do you know of your own knowledge, that the said plaintiffs did pay their workmen when not actually employed, for want of cement? Would not the nature and extent of the work undertaken by the plaintiffs necessarily protract its completion, even if the delivery of cement had not been occasionally delayed, until the month of August? Was not the delay owing to the want of stone in some degree?

Interrogatory 8th. Did not the said plaintiffs, in their contract with the defendants for the construction of said locks, stipulate and bind themselves to finish the same by the 31st day of December, in the year 1829? Did they do so? Were they completed on the 4th day of July, 1830? Do you know, of your own knowledge, that the plaintiffs paid any one person higher wages, in consequence of the orders of the company to the plaintiffs, to finish the said locks by the 4th of July, 1830, or that wages were paid to any person by the plaintiffs, when actually idle, in consequence of the want of cement?

Interrogatory 9th. State in what form and by whom the admissions, spoken of in your answer to plaintiffs' 13th interrogatory, that defendants had failed to deliver cement, as the same was wanting in the progress of the plaintiffs' work, was made; and how it was understood and agreed, that the same should be compensated for thereafter.

Interrogatory 10th. Do you know or believe that the defendants, or any officer or servant of theirs, did at any time before or after the date of the contracts of the plaintiffs for the construction of the said locks, make or cause to be made any false or feigned representations of the prices of labor, materials, or provisions, for man or beast, in the neighborhood of the said locks, so as purposely to mislead the said contractors, in making their proposals for said work, and finally contracting for the same? Were not the representations of the president of the company, on the subject spoken of in your answer to the plaintiffs' 17th interrogatory, the unofficial expressions of his own private judgment on the matters to which they related?

Interrogatory 11th. What is the difference in the cost of wooden culvert gates of sufficient quality, and cast iron culvert gates, such as those used on the said locks?

Interrogatory 12th. Did the plaintiffs construct suitable buildings for receiving and preserving in good order cement? Did you not repeatedly urge upon them the necessity of contructing such buildings, and do you not believe that much of the cement was injured, and some of it destroyed for the want of suitable storehouses?

Interrogatory 13th. Were not all the estimates, made for work done on the before mentioned locks, founded upon the stated contract price for said locks? Did the plaintiffs assent to these prices, and admit the existence of contracts accordingly?

Interrogatory 14th. Do you know that Daniel Vanslyke, formerly a resident engineer on the Chesapeake and Ohio canal, has departed this life? If you do, will you state the time of his decease?

Interrogatory 15th. Did not the plaintiffs delay to prosecute their work with proper energy in the spring, summer, and fall of 1829; and do you not believe that much of the damage which they claim to have suffered was owing to that cause?

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN, *vs.* The CHESAPEAKE and OHIO CANAL COMPANY. } *Action in the Circuit Court of the District of Columbia for the county of Washington.*

The answers of Benjamin Wright, a witness heretofore examined on the part of the above named plaintiffs, now again produced, to be cross-examined on the part of the above named defendants, taken upon interrogatories furnished by the said defendants, in said cause.

To the first cross interrogatory this deponent, answering, says, that he has a knowledge of, and knows three of the plaintiffs, viz.: Knapp, Ford, and Chapman, the other party, Acker, the deponent does not recollect, although it is said by some persons that he was at Leesburg at the letting of sections in October, 1828; and perhaps deponent did see him there, but he cannot identify the fact; deponent say, only Ford and Chapman were employed in constructing the locks, as deponent believes referred to in this interrogatory.

To the second cross interrogatory. The said deponent does not know the fact, that the plaintiffs had certain knowledge of these locks having been previously let to J. and W. Maynard, and abandoned by them; but, from the intimacy and friendly feeling which deponent knows existed at the time this contract was made between Ford and Chapman, and one of the Maynards; and from one of the Maynards doing considerable of the mason work of these lock for the plaintiffs; and there being no object in keeping this abandonment a secret, the deponent has every reason to believe, and does believe, that all the facts in and about the abandonment were well known to the plaintiffs, at the time they made their proposition to build these locks. To that part of this interrogatory which asks, "if the proposals of plaintiffs were in writing," deponent answers, and says, he is confident they were, and believes so, because that was the usual way of transacting business by the company, by their board of directors for the prosecution of the canal, and in which proposals the prices were stipulated. This proposition, being short, was generally, and, as deponent believes, put into form of contract in the case; which form is printed and filled up like the papers hereto annexed. marked *B. Wright*, B, (copied in p. 159;) contract for lock 26, specification, same mark, and also proposition same marks, all annexed; this lock was never constructed by plaintiffs.

To the third cross interrogatory the deponent says, that estimates of the cost of constructing locks on this canal for a great number, and particularly for the locks which plaintiffs did construct, were made by the board of engineers of the Chesapeake and Ohio canal, as appears by paper marked A,

hereto annexed, (copied in page 153.) This paper, dated March 5, 1829, was, as deponent believes, after the abandonment by J. and W. Maynard, and was made at the special instance of the president and directors of the canal for their private use, and was signed by the deponent and Nathan S. Roberts, and John Martineau, and is the paper alluded to in his answer to the sixth interrogatory of the plaintiffs.

To the fourth cross interrogatory the deponent says, that the paper marked A, and referred to in the preceding interrogatory, was in the hands of N. S. Roberts, one of the signers; and deponent has heard one of the plaintiffs say, he saw this, or a copy of it in his hands. By what authority it was shown by Mr. Roberts to plaintiff or plaintiffs.

To the fifth cross interrogatory deponent says, that he knows there was a clause in the printed form of specifications of contracts, referring to furnishing cement by the company, conditionally as may be seen in paper hereto annexed, marked *B. Wright,* B, (copied in page 159,) and referred to in former interrogatory, on third page of said specifications. The deponent knows that defendants did furnish some cement in 1829; and that they did agree, formally, in first part of 1830, as deponent thinks, to furnish the cement as wanted, and to be delivered at places where a boat could land nearest to the locks. Plaintiffs were to take the cement at the boats, as deponent believes. The deponent cannot say at what date, exactly, this latter arrangement was made; but deponent believes that it was before masonry was begun in spring of 1830.

To the sixth cross interrogatory the deponent says, that he believes there was an abundance of stone near or at Sheperdstown, which makes excellent cement; but deponent has not seen it in its natural bed.

To the seventh cross interrogatory the deponent says, he does not know that plaintiffs paid their men for the time lost by waiting for cement. Deponent never had any special knowledge of the manner the plaintiff hired his men. In regard to the work being completed, the deponent believes it might have been done at an earlier period than it was done, if cement had been furnished as wanted. The deponent cannot say but there was delay for want of stone of a particular kind. Deponent believes that complaints were made by the resident engineer, as appears by reports made to deponent by the resident engineer, and enclosed by deponent to the board or president and directors of the canal, dated November 4, 1829, enclosing report dated November 3, 1829, both marked *B. Wright*, C, (copied in page 180 and 181;) also, by report of resident engineer, dated April 7, 1830, marked *B. Wright*, D, (copied in page 186,) all which papers are hereto annexed; and which statement, as made by the resident engineer, deponent believes to be true.

To the eighth cross interrogatory deponent says, that he believes the printed forms of contracts and the specification connected therewith, showing the plan of constructing locks, was signed by the plaintiffs or some of of them (and did contain a promise to complete these locks by the 31st of December, 1829.) The work was not so completed, and deponent believes the whole was not done until August, 1830; deponent does believe there was an understanding that the contract should be extended into 1830, but deponent cannot say how he arrived at these impressions. Deponent does not know that plaintiffs did pay higher wages than usual, because the company had, by their board of directors, given orders to have the work completed by the 4th of July, 1830, so as to let in water; deponent recollects that he often heard complaints made by plaintiffs, in spring and summer of

1830, of being obliged to pay higher wages for masons and laborers, and that a want of cement would force him into the sickly season. The remaining part of this interrogatory is answered by deponent in his answer to the seventh interrogatory.

To the ninth cross interrogatory, the deponent answers, and says: That in his answer to thirteenth interrogatory of the plaintiffs, as sworn before Judge Irving, and referred to in this interogatory by defendants, the deponent does not mean to say, that admissions were distinctly made by any one of the officers of the Canal Company, or if they were made, deponent cannot repeat them; but the deponent does mean that, at the meeting referred to, and mentioned in the answer to the thirteenth interrogatory of plaintiffs, before referred to, and now intended by this interrogatory, the plaintiffs did say, that defendants failed in furnishing cement as was understood by deponent to have been agreed upon, and deponent does not believe that any one of the committee did at that meeting deny this fact. The deponent did believe, from the conversation at that meeting, that the failure to deliver cement was admitted as has been charged by the plaintiffs. This was the impressions of deponent at that time. The deponent does not intend to make his answer to the thirteenth interrogatory of plaintiffs as referred to above, carry any further weight than is fully expressed in the same, so far as to mean that the Chesapeake and Ohio Canal Company would do justice to plaintiffs when they had in any way failed on their part.

The deponent says further, that this transaction having passed nearly four years from the time it happened, the deponent may not be truly and perfectly correct in his impressions, as since the deponent answered the said interrogatory above referred to, he has seen the order of the committee as the result of that meeting; this order will speak for itself *although the impressions of the deponent at the time, and now are, as he expressed them, in his answer to the plaintiffs' thirteenth and fourteenth interrogatory.*

The deponent does not know how, or in what manner, the failure to deliver cement was to be adjusted, and deponent means to say only that defendants said they would do justice on a final settlement of this lock contract.

To the tenth cross interrogatory, the deponent says: That he does not know that any of the defendants or any officer of the company did make any representations as to the price of labour, to the plaintiffs, or any other person with intent to mislead them, neither does deponent believe that any officer or individual of the company, did say any thing on this subject other than with good intention, and believing the truth of what they said. And deponent thinks that, as the estimate referred to, in answer to the third cross interrogatory, as paper marked A, was made, as by date March 5, 1829, and the proposition of the plaintiffs must have been only a few days after, as deponent believes, these conversations or remarks could not have had any material effect to mislead any one who was desirous to propose for locks.

The deponent believes that he has taken expressions made by the president of the company, in 1828, as to the labour and provisions as of 1829; these impressions arise from having seen, on the 9th of May, the annexed paper, marked A, before referred to; and deponent believes, from the short period he recollects intervened between March 5, 1829, and the time the

propositions were made by plaintiffs, that deponent has transposed some events as to the contracts on sections, and on locks taken by some of plaintiffs.

The expressions as referred to in deponent's answer to seventeenth interrogatory of the plaintiffs, were all unofficial, and the opinion of the president of the canal company, as his private judgment, on the matters to which they relate.

To the *eleventh* cross interrogatory the deponent says: That the difference between cast-iron gates and wooden frames, and wooden gates strapped with iron, as made on the Erie canal, cannot be any thing material. The cast-iron frames and wooden gates, well strapped with iron, the deponent believes would be full as expensive as those used on the Chesapeake and Ohio canal, by *by* plaintiffs.

To the *twelfth* cross interrogatory the deponent says: That the plaintiffs did not construct good and safe buildings for holding the cement, and deponent well recollects that he often found the cement sheds with the board roofs insecure, and the cement exposed to weather, and deponent often requested plaintiffs or some of them to take better care of the cement. The deponent has seen cement in plaintiffs' sheds much injured, and he believes nearly ruined.

Deponent may have been deceived as to the cause of this, as there was much cement injured in the boats before delivered to plaintiffs; deponent cannot say as to quantity injured.

To the *thirteenth* cross interrogatory, deponent says: That he believes a general scale of prices, of each item forming a lock, was made out by himself as the engineer, and so made out as to enable payments to be made on account of labour and materials, and also deponent believes that, although such scale was not noticed in the contract, it was to enable the engineer to certify to proper payments for the contractor from time to time, and was so understood by plaintiffs, received monthly estimates, as deponent believes, while work was going on under this scale, and deponent believes plaintiffs assented to these, but he cannot be positive as to this.

To the *fourteenth* cross interrogatory the deponent says: He does not know that Daniel Van Slyke is dead, who was the resident engineer on the Chesapeake and Ohio canal, but deponent has seen his death published in newspapers, and heard his brother-in-law, John Martineau, say that he was dead, and deponent believes it true, and has no reason to doubt it. Deponent thinks his death took place about last of year 1831.

To the *fifteenth* cross interrogatory, the deponent says: That he thinks the plaintiffs might have forwarded their work a little more in 1829, by getting more stone, and delivering them at the sites of the locks, but deponent does believe, that the want of cement in 1829, as well as 1830, was the principle cause of the delay in getting the locks completed, they might, by bringing more stone in 1829, forwarded their work, provided they could have spared some of their boats to bring down cement. The deponent says that he does not know of any thing further material to this cause.

Sworn this 18th of May, 1834.

BENJAMIN WRIGHT.

Before me,

JOHN T. IRVING,
First Judge of the Court of Common Pleas,
for the city and county of New York.

ABRAM KNAPP, BENJAMIN FORD, HENRY ACKER, and FREDUS CHAPMAN,
vs.
The CHESAPEAKE and OHIO CANAL COMPANY.

Action on the case in the Circuit Court of the District of Columbia, for the county of Washington.

I, John J. Irving, first judge of the court of common pleas, for the city and county of New York, not being of counsel or attorney for either of the parties mentioned in the above caption, or in any manner interested in the event of the said cause, do hereby certify, that, on this tenth day of May, in the year eighteen hundred and thirty four, at my office, in the city of New York, and State of New York, I caused to come before me Benjamin Wright, a witness heretofore examined on the part of said plaintiffs, in this cause, now again produced before me by the said defendants, to be by them cross examined on interrogatories furnished by the said defendants, and have taken the deposition of the said witness upon such interrogatories, which interrogatories and the answers or depositions thereto, are hereunto prefixed and enclosed; that the said depositions or answers were reduced to writing by the said deponent in my presence, and subscribed by him in my presence after the same had been reduced to writing.

That, previous to the taking of the said deposition, the said deponent was by me carefully examined, cautioned, and sworn to testify the whole truth; that, at the time of taking the same, the said Benjamin Wright resided at the city of New York, in the State of New York, more than one hundred miles from the city of Washington, the place of trial of the said cause, and that his so residing and being more than one hundred miles from the said city of Washington, was the reason and cause of taking the said deposition. And that I have not given or served, or caused to be given or served, any notice to the said plaintiffs, or their attorney or counsel, of the taking of the said depositions, or to be present thereat and put interrogatories, if they should think fit, because neither the said plaintiffs, or either of them, or any counsel or attorney of theirs, to my knowledge, was within 100 miles of the said city of New York.

In testimony whereof I, have enclosed the said deposition and interrogatories, and do hereby return the same under my hand and seal, with the reasons of taking the same to the honorable the judges of the circuit court of the District of Columbia, for Washington county, this tenth day of May, in the year 1834.

JOHN J. IRVING, [SEAL.]
First Judge of the Court of Common Pleas, of the city and county of New York.

Estimate A, referred to in third cross interrogatory to B. Wright, and by him referred to in his answer to the same, at page 137 and 143.

A.

GEORGETOWN, *March 5*, 1829.

To the President and Directors of the Chesapeake and Ohio Canal Company.

The board of engineers, to whom was referred the subject of graduating a price to be paid for the materials and labor necessary in constructing a lock, according to the situation and other circumstances, that having viewed the

location of said locks and the quarries where the stone for the same are to be obtained, and having ascertained, as near as the case will admit, the value of the other materials, and of the labor of constructing each lock, the following *the following* estimates of the same are respectfully submitted:

Lock No. 5. Granite face stone quarrying. Face stone, at 20 cents a foot. Cutting do. at 42 cents a foot		
Quarrying and cutting 6000 feet of face stone at 62 cents a foot		$3,720
These face stone to be drawn one and a half or two miles, 600 tons at 50 cents		300
Backing, quarried, and drawn half a mile, 800 perches at 55 cents		440
Estimated cost of the face stone and backing, delivered		$4,460
Foundation timbers 2846 feet furnished and laid, at 15 cents	$427	
First course of plank 5000 feet, two and a half inches, at $3 50	175	
Second do. do. 2,600 feet, two inch, at $3	78	
Putting down four rows of sheet piling	40	
Puddling between the foundation timbers, and laying both courses of plank	120	
Putting down two locust mitres, including materials and workmanship	30	
3,000 bushels of cement, (but may require more,) at 40 cents	1,200	
5,000 do. of sand at 6 cents	300	
1,200 perches of masonry laid in each lock, at 75 cents	900	
Lock gates, paddle gates, culvert gates, including materials and workmanship, and all descriptions of iron used in constructing each lock, amounting in gross to	600	
The upper to the lower level by the lock, the bottom and sides of stone,	200	$4,070
Expense per foot lift equal to $1,066 67, total cost		$8,530
Lock No. 6. The expense of quarrying, cutting, and delivering the stone and other materials, including the workmanship of this lock is similar in all respects to lock No. 5.		
Expense per foot lift equal to $1,066 67, total cost		$8,530
Lock No. 7. Quarrying and cutting granite, as above stated, 6,000 feet, at 62 cents		3,720
Face stone to be drawn one-eighth of a mile, 600 tons, at 25 cents		150
Backing do. same distance, 8000 perches, at 40 cents		320
Add the amount of other materials and workmanship		4,070
Expense per foot lift, equal to $1,032,50, total cost per estimate		$8,260

Lock No. 8, granite. The expense of stone about the same as Nos. 5 and 6	4,460
Add the amount of all the materials and workmanship, as above	4,070
Expense per foot lift, equal to $1,066 67, total cost of this lock	$8,530
Lock No. 9. Face stone from Seneca, quarrying 15 cents, face stone per foot.	
Cuping including hollow groin and coping, 25 cents per foot, *sand stone.*	
Quarrying and cutting 6000 feet, at 40 cents per foot	$2,400
Backing of granite, 800 perches, drawn quarter to half a mile, at 55 cents	440
Delivering the face stone 600 tons from Seneca, at $2 50	1,500
Quarry rent at Seneca, required per lock	100
Add the amount of other materials and workmanship	4,070
Expense per foot lift, equal to $1,063 75, total cost	$8,510
Locks Nos. 10 and 11. The face stone from Seneca, 6,000 feet, quarried and cut, at 40 cents	2,400
Delivering the face stone 600 tons from Seneca, at $2 50	1,500
Quarry rent for each lock	100
Backing for each, rather nearer 800 perches, at 50 cents	400
Add the amount of all other materials and workmanship	4,070
Expense per foot lift, equal to $1,058 75, total cost	$8,470
Lock No. 12. Face stone from Seneca, amount the same as 9, 10, and 11	$4,000
Backing stone not convenient, 800 perches, at 70 cents	560
Add the amount for all other materials, and labour of constructing a lock	4,070
Expense per foot lift, equal to $1,078 75, total cost	$8,630
Locks Nos. 13 and 14. Face stone from Seneca, amount of each, same as above	4,000
Backing for each, rather more convenient, 800 perches at 50 cents	400
Add the amount for all other materials, and for workmanship, constructing each lock	4,070
Expense per foot lift of each, equal to $1,058 75, total cost	$8,470
Locks Nos. 15, 16, 17, and 18, situated in the rocky ravines at the Great Falls of Potomac, difficult of access.	
Face stone from Seneca, 6,000 feet quarried, and cut, at 40 cents	$2,400

Delivering the same, 600 tons, at $3	1,800
Quarry rent for each lock	100
Backing of granite, 800 perches, at 40 cents	320
Add the amount of other materials and workmanship on the lock	4,070
Expense per foot lift, of each lock, equal to $1,086 25, total cost	$8,690

Locks Nos. 19 and 20. More accessible, being situated near the head of the Great Falls.

Faced stone from quarrying and cutting 6000 feet, at 40 cents	2,400
Transporting the same, 600 tons, (for each lock,) at $2 per ton	1,200
Quarry rent, do.	100
Backing stone, 800 perches, do. at 40 cents	320
Add the amount for other materials and workmanship to complete the lock	4,070
Expense per foot lift for each, equal to $1,011 25, total cost	$8,090

Lock No. 21. Face stone from Seneca, 6000 feet quarried and cut, at 40 cents a foot	$2,400
600 tons delivered at 50 cents a ton	900
Quarry rent, at do.	100
800 perches of backing at 50 cents	400
Add the expense of all other materials and workmanship to complete the lock	4,070
Expense per foot lift, equal to $983 75, total cost	$7,870

Lock No. 22. Face stone from Seneca, 6,000 feet, quarried and cut, at 40 cents,	$2,400
Transporting the same by land, 600 tons, 3½ miles, at $1 50 cents,	750
Quarry rent	100
Backing stone, 800 perches, at 50 cents,	400
Add the estimated expense of all other materials and labor to complete this lock,	4,070
Expense per foot lift equal to $965. Total cost,	$7,720

Lock No. 23. Face stone from Seneca, 6,000 feet, quarried and cut, at 40 cents,	$2,400
Transporting the same by land, 600 tons, 3½ miles, at 80 cents,	480
Quarry rent,	100
Backing stone, probably from same place (or ½ mile below,) 800 perches, at 60 cents,	480

Add the estimated expense for all other materials and labor to complete the lock, - - - -	4,070
Expense per foot lift equal to $941 25, total cost - -	$7,530

Lock No. 24. Adjoining the aqueduct over Seneca creek.

Quarrying and cutting 6,000 feet of face stone, at 40 cents,	$2,400
Delivering the same, 600 tons, at 50 cents, - -	300
Backing do 800 perches, at 50 cents, - - -	400
Quarry rent, - - - - - - -	100
Add the expense of materials and labor to complete this lock, - - - - - - - -	4,070
Expense per foot lift equal to $908 75, total cost -	$7,270

Lock No 25. Edward's Ferry. Quarrying and cutting 6,000 feet, supposed to be free stone, at 40 cents, -	$2,400
Delivering the same 2½ or 3 miles by land, 600 tons, at $1 25, - - - - - -	750
Backing to be brought near the same distance, 800 perches, at $1, - - - - - -	800
Add materials and labor per estimate, to complete this lock,	4,070
Expense per foot lift, equal $1,002 50, total cost -	$8,020

Lock No. 26. Face stone brought from the quarry five miles above Monocacy, 6,000ft. qu'd. and cut, at 40 cts.	$2,400
Transporting the same by land and water, 600 tons, at $1 60, - - - - - - -	960
Backing found within ½ a mile, 800 perches, at 55 cents,	440
Add the amount estimated for materials and labor to complete the lock - - - - - -	4,070
Expense per foot lift equal to $983 75, total cost -	$7,870

Lock No. 27. Face stone from same quarry, 600 feet quarried and cut, at 40 cents, - - - -	$2,400
Transporting (5 miles) 600 tons land and water, at $1 50,	900
Backing, 800 perches, at 50 cents, - - -	400
Add the estimate for materials and labor to complete the lock, - - - - - - - -	4,070
Expense per foot lift equal to $971 25, total cost -	$7,770

It will be observed, that no allowance is made for quarry rent from the 5th to the 8th, nor from the 25th to the 27th locks, inclusive, as no amount has as yet been demanded. The foundation timbers of the locks above Seneca might be obtained perhaps 2 or 3 cents in the foot less than nearer to Georgetown, but the inconvenience of obtaining the stone may make up the difference. In the above estimates each lock pit is supposed to be prepared for the contractors, and the excavation and preparation of the same, is supposed to be paid for, whether rock or earth by the cubic yard, according to

quality. If stone suitable for backing is excavated from any lock pit, the quantity suitable is to be deducted from the estimated quantity of backing stone, and the earth so excavated, which is suitable for banking or landing up the lock, is to be used for that purpose as the work progresses, for the accommodation and at the expense of the contractor, but the balance of earth necessary to complete the landing up of any lock, is to be paid for by the cubic yard in just proportion to the expense of obtaining it, and for the labor expended in puddling or packing the embankment of any lock, according to the requisition of the engineer, who is to certify the same. If, in the course of examination, face stone for any lock should be found more convenient, and of such a quality as to make any considerable diminution in the expense of obtaining the same, it might be proper to reserve the right of making suitable deductions in such cases.

BENJ. WRIGHT,
NATHAN S. ROBERTS,
JOHN MARTINEAU,
Members of the board of engineers, Ch. and Ohio Canal.

B.

Specification of locks of eight feet lift, on the Chesapeake and Ohio Canal, referred to in B. Wright's answer to the second and third cross interrogatory, at page 143 *and* 144.

1st. It is believed that the greater part of the foundations of the locks will be on rock, and, when this is the case, the excavation is to be governed by circumstances, of which the engineer of the company shall give particular directions.

2d. Eight timbers, of 38 feet length, and not less than 10 inches thick, 4 of them to be placed at the head, and 4 at the foot of the lock, 82 timbers 30 feet long and 10 inches thick, and to average 12 inches in width. These are to be bedded level, with their upper surfaces well and truly hewed, so as to form a level and uniform surface on which to lay the plank. The timbers may be of any wood which will hold the pin well. Three courses of sheet pile plank, two inches thick, to be put down at least 5 feet below the bottom of the timbers and the whole length of the timbers. The position of this sheet piling is designated on the plans, but may be varied according as the engineer shall direct. It is to be put down with joint edges if required, and battened, if necessary, with boards; so as to secure the foundation against any water passing under the lock. Puddling to be done on each side of the sheet piling, and between all the timbers, if required.

3d. On these timbers, there is to be laid a course of 2½ inch plank, which shall be jointed and squared, from the breast and under the same, to the foot of the lock, and for the width of the chamber and recesses, and under the culverts. Before the stone work shall commence, there shall be a second course of plank, two inches thick, well jointed and laid from above the culverts, where the water enters above the upper gates, to a point three feet below the centre of the chamber of the lock, and extending from the face of the lock to each side of the culvert, or under the wall, if directed; or if it shall be found to be an additional security, this planking (or second course) shall be well fitted in after the culverts shall have been commenced, and before they shall be covered with masonry. The whole planking to be

well tree nailed, with tree nails of one inch diameter and nine inches long, and to average at least 12 tree nails to each plank, where not covered with masonry.

When the masonry is completed, there shall be a second course of planking, of first rate heart pine, two inches thick, well jointed and squared, and laid as nearly water-tight as possible, over the whole of the other planking, from the breast of the lock throughout the chamber, and below the lower gates; this planking to be secured with spikes nine inches long, at the ends of the plank. There shall be two spikes at each end of each plank; and at least 10 tree nails, of one inch diameter and nine inches long, in each plank, to secure it well to the timbers below.

4th. The masonry shall be built in the following manner: The main walls to be 7 feet thick, besides one foot for buttresses or counterparts, from the head of the lock to three feet below the enter of the chamber, and for at least three feet high, and then to fall of one foot on each side, so as to reduce the main wall to 6 feet, and buttresses to 2 feet in width, which is the thickness of all the walls from below where the culvert enters the chamber to the lower end of the lock, except the head walls and tail walls, which are to be 12 feet at right angles with the face of the lock walls.

All the face stone to be well cut and coursed in every part of the lock which is exposed to view when the lock is completed. No course of stone to be less than a foot thick, and no stone for face work to have less bed than face. The stone to be of a quality to endure frost and sun, and such as shall be approved by the engineer or superintendent of masonry of the company.

The stone for the backing or dead work, to be of such size and quality as shall make the best kind of permanent, durable, solid wall.

Of the cut stone for face work, there shall be a header or bond stone for at least every ten feet in length on each course, dividing the spaces in every upper course between the headers in the course below, which shall be not less than 2 feet in width on the face, and generally wider, and shall extend at least four feet into the wall.

The cut stone shall have parallel beds, in all cases; or, at most, not deviating one quarter of an inch from parallel beds, so as to lie firm and solid on each other. No stone called a streatcher shall be less than three feet long, nor its end make an even joint with the ends of the adjacent stones of less than twelve inches throughout. The coping shall be not less than 12 inches thick and three feet wide, and shall bed horizontally, and be so laid as to present a nearly uniform width on the top, which shall be fairly and handsomely cut. There shall be cramps of such size as shall be directed, to connect the coping around the gates, and from the gates to the lower and upper ends of the locks. If bolts at the head of the lock shall be found better to connect, in one solid mass, the three upper courses of the round corners, so as to prevent any stone from being started by the stroke of a loaded boat, they shall be put in, in such manner as shall be directed, and secured by lead. The whole of the masonry to be laid in good water cement, and grouted at least every course of face work. The cement to be of a quality to be approved by the engineer or superintendent of masonry, and the proportion of sand, and the manner of working and tempering the mortar, to be approved by the superintendent or engineer. The sand used shall be sharp, clean sand, washed, if required, and such as will make the best of cement when mixed with other proper ingredients.

5th. The plan of the masonry, as to its foundation and elevation, shall be furnished each contractor, if required; and if any explanations are necessary, they shall be given by the engineer or superintendent of masonry at all times when required.

6th. When the masonry of the lock is completed according to the intention as above, the lock walls shall be banked up with earth behind them, so as to be level with the coping, and in such manner as shall be directed by the engineer.

7th. The mitre sills shall be of locust timber, particularly the two mitre pieces; be eight inches thick, and planed and jointed; and the lower mitre sill shall be placed on the lower floor, and tree-nailed and fitted down, so as to be nearly water-tight on the flooring as may be, and to be bolted with iron bolts three-fourths of an inch in diameter and 18 inches long. There shall be from six to eight such bolts in each mitre sill.

The breast of the lock shall be built of masonry, and the part next the chamber shall be of cut stone in courses, and six feet high from the flooring, and six feet thick.

8th. On the top of the breast and upon a level, there shall be placed 12 timbers 25 to 16 feet long, 10 inches thick, and 12 inches wide. Six of these timbers shall be placed close together, the lower one directly over the front of the breast, and then the other five as close together as they can be. The remaining six timbers shall be placed at equal distances, so as to have the upper one on a line with the head of the lock. These timbers shall be laid level, so as to receive plank of good heart pine two inches thick, which shall be jointed, and the whole of the timbers well covered with plank, and tree-nailed with at least twelve tree-nails in each plank. On this planking the mitre sill shall be placed, and marked on the plan. It shall be of locust timber, and well planed and jointed, and secured with bolts, &c., as was directed in relation to the other mitre sill. This mitre sill is intended to be 7 feet 8 inches from the top of the lock flooring.

9th. The culverts to pass the water to fill the lock are to be square opening in the recesses of the upper gates at least four feet high, and two and a half feet wide, in the clear. Within this, and retaining the full width of two and a half feet and four feet, there shall be a cast iron frame, so placed as to receive a paddle or valve to turn upon its centre, and within this frame the paddle or valve shall be fitted, with a rod of 2¼ inches diameter passing through it, and extending up through the coping, on the top of which, at a proper height, it shall receive a crank or lever to open or shut it. There shall also be three or more air holes directly over the culvert, to let out the air when the water is passing into the lock.

The stone used to form the sides of the culverts shall be cut and made perfectly straight, with good joints, so that, with good water cement, the culverts can be made tight and secure in the sides. They are to be covered with good flat stone, not less than one foot thick and three feet wide, well jointed, so as to have good fair joints, and to be so firmly and securely laid as to admit of good solid masonry over them.

These culverts are to be about two and a half feet square from their entrance above the upper gates to the first discharging hole; and from the first to the second, two feet three inches; and from the second to the third, two feet. The discharging places are to be as follows: the first and second from the breast eighteen inches wide, and the third two feet wide.

well tree nailed, with tree nails of one inch diameter and nine inches long, and to average at least 12 tree nails to each plank, where not covered with masonry.

When the masonry is completed, there shall be a second course of planking, of first rate heart pine, two inches thick, well jointed and squared, and laid as nearly water-tight as possible, over the whole of the other planking, from the breast of the lock throughout the chamber, and below the lower gates; this planking to be secured with spikes nine inches long, at the ends of the plank. There shall be two spikes at each end of each plank; and at least 10 tree nails, of one inch diameter and nine inches long, in each plank, to secure it well to the timbers below.

4th. The masonry shall be built in the following manner: The main walls to be 7 feet thick, besides one foot for buttresses or counterparts, from the head of the lock to three feet below the enter of the chamber, and for at least three feet high, and then to fall of one foot on each side, so as to reduce the main wall to 6 feet, and buttresses to 2 feet in width, which is the thickness of all the walls from below where the culvert enters the chamber to the lower end of the lock, except the head walls and tail walls, which are to be 12 feet at right angles with the face of the lock walls.

All the face stone to be well cut and coursed in every part of the lock which is exposed to view when the lock is completed. No course of stone to be less than a foot thick, and no stone for face work to have less bed than face. The stone to be of a quality to endure frost and sun, and such as shall be approved by the engineer or superintendent of masonry of the company.

The stone for the backing or dead work, to be of such size and quality as shall make the best kind of permanent, durable, solid wall.

Of the cut stone for face work, there shall be a header or bond stone for at least every ten feet in length on each course, dividing the spaces in every upper course between the headers in the course below, which shall be not less than 2 feet in width on the face, and generally wider, and shall extend at least four feet into the wall.

The cut stone shall have parallel beds, in all cases; or, at most, not deviating one quarter of an inch from parallel beds, so as to lie firm and solid on each other. No stone called a streatcher shall be less than three feet long, nor its end make an even joint with the ends of the adjacent stones of less than twelve inches throughout. The coping shall be not less than 12 inches thick and three feet wide, and shall bed horizontally, and be so laid as to present a nearly uniform width on the top, which shall be fairly and handsomely cut. There shall be cramps of such size as shall be directed, to connect the coping around the gates, and from the gates to the lower and upper ends of the locks. If bolts at the head of the lock shall be found better to connect, in one solid mass, the three upper courses of the round corners, so as to prevent any stone from being started by the stroke of a loaded boat, they shall be put in, in such manner as shall be directed, and secured by lead. The whole of the masonry to be laid in good water cement, and grouted at least every course of face work. The cement to be of a quality to be approved by the engineer or superintendent of masonry, and the proportion of sand, and the manner of working and tempering the mortar, to be approved by the superintendent or engineer. The sand used shall be sharp, clean sand, washed, if required, and such as will make the best of cement when mixed with other proper ingredients.

5th. The plan of the masonry, as to its foundation and elevation, shall be furnished each contractor, if required; and if any explanations are necessary, they shall be given by the engineer or superintendent of masonry at all times when required.

6th. When the masonry of the lock is completed according to the intention as above, the lock walls shall be banked up with earth behind them, so as to be level with the coping, and in such manner as shall be directed by the engineer.

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9th. The culverts to pass the water to fill the lock are to be square opening in the recesses of the upper gates at least four feet high, and two and a half feet wide, in the clear. Within this, and retaining the full width of two and a half feet and four feet, there shall be a cast iron frame, so placed as to receive a paddle or valve to turn upon its centre, and within this frame the paddle or valve shall be fitted, with a rod of 2½ inches diameter passing through it, and extending up through the coping, on the top of which, at a proper height, it shall receive a crank or lever to open or shut it. There shall also be three or more air holes directly over the culvert, to let out the air when the water is passing into the lock.

The stone used to form the sides of the culverts shall be cut and made perfectly straight, with good joints, so that, with good water cement, the culverts can be made tight and secure in the sides. They are to be covered with good flat stone, not less than one foot thick and three feet wide, well jointed, so as to have good fair joints, and to be so firmly and securely laid as to admit of good solid masonry over them.

These culverts are to be about two and a half feet square from their entrance above the upper gates to the first discharging hole; and from the first to the second, two feet three inches; and from the second to the third, two feet. The discharging places are to be as follows: the first and second from the breast eighteen inches wide, and the third two feet wide.

Flumes around the locks, four feet wide in the clear, with granite side stones, and bottoms paved, will extend on the side of the locks opposite the towing-path, from the upper to the lower level, for a supply of water from one to the other.

Lock Gates.

The plans of the gates being given, with the size of the timbers and manner of framing them, there are no further directions necessary than to say that the timber ought to be of locust, if to be obtained; and, if nothing else, the bars are to be of locust timber. The whole to be worked with plane and jointer. The iron work is represented on the plan, and particular directions will be given as to all the thickness of irons. The T and L irons are to be of iron bars three-eighths of an inch thick and two inches wide. The paddle or pivot gates are to be well and strongly secured by irons, where required, and the rod to turn them to be two inches diameter. The wrench or crank to be strong and well proportioned.

The balance beams are to be of white oak, ten inches square at the small end, twelve inches at the heel post, and sixteen inches at the largest end; they are to be about twenty-four feet long.

As it is supposed that very few, or none of the foundations of lock will require bearing piles, there is no mention made of them. When they are necessary, the finding and driving of the piles is to be a separate charge, for which a price is to be agreed upon between the parties, or to be paid for at the appraisal of the engineer.

Double Locks, and contingencies provided for.

As some variation may be made in the mode of constructing the single locks, to which the preceding specification applies, and it is in contemplation, by the president and directors of the Chesapeake and Ohio Canal Company, to double the locks on a part of the canal line, the following supplemental explanatory specification is intended to meet the plan that may be finally decided on, to suggest the proposed variations, and, if double locks are preferred, what further alterations may be necessary.

In relation to the single lock, the variations proposed are as follows: Instead of placing the mitre sill of the upper gates only one foot below the bottom of the upper level, or on the flooring, placed on the top of a breast wall six feet high, with gates suitable thereto, and having only three discharging orifices from the side culverts on each side of the lock, it is proposed to place the top of the mitre sill of the upper gates only one foot above the first course of planking on the foundation timbers, and on the top of the timber work, put together in the manner of a mitre sill, and filled up so as to be solid, as also the mitre sill, which, together with that on which it rests, shall be firmly bolted to the foundation timbers of the lock. The breast will, consequently, be moved as much nearer the head of the lock as will leave ample space for the upper gates to open and shut. This will reduce the timber and planking above the breast of the lock, and require the upper gates to be lengthened several feet. For the remaining distance, the work will be done as prescribed in the preceding specification. A second course of plank, between the mitre sill and breast, will be neatly scribed on the timber and stone work, secured as in other parts, and an upright facing of two inch plank, jointed and spiked against the face of the mitre sill, extending to within four inches of its upper surface, and scribed closely to the flooring below, the upper ends to be levelled downwards, so that nothing can remain on them, will be required.

For three it is proposed to substitute four discharging orifices from the side culverts into the lock chamber, if required, not materially varying in their dimensions from those already described, nor the mode of constructing them. On the plan now in view, the aperture or mouth of the side culvert will be connected with the floor of the lock, the latter forming the bottom thereof, beginning from the centre of the recess for the upper gates. Its dimensions, together with the whole or any part of the culverts, may be varied at the pleasure of the president and directors, or their authorized agent or engineer.

Frames of locust wood may be substituted for cast-iron frames, to be set in the stone work near the mouth of the culverts, circumscribing the pivot or paddle gates, and to be made and placed as follows: The timber to be five by six inches square, neatly and truly planed, dove-tailed together at the angles, with a cast-iron box let in, both above and below, provided with a hole through the centre, through the upper, and into the lower one, which the iron rod to sustain and manage the pivot valve is to pass; the faces of the upright sides to have a rabbit formed by three-eight iron, screwed on, for the pivot gates to shut against. This frame is to be placed against the smooth face of a recess to be formed for its reception, and secured by wooden wedges around its outside. There shall be the same number of paddle gates in the upper lock gates as in the lower ones, and they shall be of the same dimensions, construction, and materials.

When locust timber, for lock gate frames, shall be supplied by the company, a reasonable sum shall be deducted from the cost of each lock, to be determined by the engineer.

When iron gates are supplied, the cost of the wooden gates, according to the estimate of them, shall be deducted.

Should cut stone be used only in front of the lock, say for hollow quoins for recesses, (and for the side walls, from the gates to each end of the lock,) and for the side culverts, including the covering the same, for the coping the tops of walls throughout, as described in the preceding specification, the remaining part being of hammered granite stone, coursed, and, in all other respects laid and grouted as specified, as is known to the parties that excellent quarries of granite occur on the line of the canal between Georgetown and Watt's branch, several miles west of the Great Falls, an amount shall be deducted from the sum allowed for the locks of cut stone throughout, equivalent to the difference of the value of the materials.

It is believed that hydraulic cement, suitable for the construction of lock masonry, may be obtained on the Potomac, as far east as Shepherdstown.

Its average cost, it is presumed, will not exceed forty cents the bushel, delivered at the shore opposite the locks; should it be found not suitable for the purpose, and it become necessary to import the New York hydraulic cement, or Parker's Roman cement, the president and directors will furnish to the contractor cement so imported, in good season, say by the first of May, eighteen hundred and twenty-nine, at the price of forty cents the bushel, which shall be deducted from the sum to be paid for the lock if the contractor furnished the cement himself. The extent of its use, if it be so supplied, may be limited by the engineer to a certain distance from the face of the wall.

If approved quarries of stone shall be found within two miles of the Potomac, or its navigable waters, within a reasonable distance of the place where the same is to be used, that will afford stone of such dimensions as to

admit of it, the following scale of coursing shall be adopted, viz.: beginning with no less than two feet in thickness or build for the first course, the next twenty-two inches, decreasing upwards two inches each course. No course of stone shall exceed in thickness the course immediately below it. Two courses of the same thickness may follow each other, or a course may be diminished half an inch, an inch, or one and a half inches, so as best to suit the stone of a quarry to the object in view; that is, to diminish in thickness upwards.

The lock pit, if the locks be double, must be excavated 141 feet long, 56 feet wide on the bottom, and one foot eight inches below the bottom of the canal.

The foundation timbers will be 82 in number, if 58 feet long, but 164, if of 29 feet length, making two courses in the last case; 16 pins to be placed at the head and foot of the lock, 34 feet long, to extend under the return or wing walls, and to be laid as prescribed in the first part of the preceding specification. The same of the sheet piling.

The masonry will, in all respects, be of the same materials, and executed in the same manner as required for the single lock. The dividing wall will be 10 feet from face to face; but may, if required, be reduced to a less thickness; in which case, the difference in quantity shall be deducted from the cost of the lock, at the estimate of the engineer or superintendent of masonry.

The culverts to fill the locks shall be the same, in their construction, for each lock as for single locks.

The gates, and every thing appertaining to them, shall be similar to those required for a single lock, except that the balance beams next to the centre wall shall not exceed in length 12 feet back of the heel post of the gate, and be so placed as that they shall clear each other when the gates open and shut. A plan, explanatory of the mode of making them, together with every other part of the lock, will be furnished, when required, agreeably to the above specification. Flumes are required, as in the case of single locks.

Should any alteration in the above plan and specification for locks be deemed necessary, the president and directors, or their engineer, may vary accordingly; and whatever extra cost may be involved thereby shall be estimated by the engineer, and paid to the contractor.

WASHINGTON, *March*, 1829.

We propose to excavate the lock pit, and construct and embank lock No. 6, on the Chesapeake and Ohio Canal, according to the plan and specification exhibited by the canal company, for the following prices, viz.:

For excavating the lock pit, earth, gravel, or loose stone, or materials other than described below, per cubic yard, - -	$00 16
Hard pan, soft slate, or rock, per cubic yard, - - -	00 30
Hard slate or rock, quarried without blasting, per cubic yard,	00 40
Slate or rock, which requires blasting, ditto -	00 80
For erecting the lock of 8 feet lift, at per foot lift, - -	983 75
For embankment. The lock is to be completely embanked, without additional charge, if the materials excavated from the lock pit are sufficient for that purpose; if not sufficient, such additional quantity as may be requisite to be paid for, per cubic yard, - - - - - - - -	00 25

If, in excavating the lock pit, stone suitable for backing is found, the contractor shall make such allowance therefor to the company, as an engineer may determine.

Any puddling or packing required in making the embankment, is to be paid for according to the estimate of an engineer.

(Signed.) KNAPP, FORD, ACKER, and CHAPMAN.

It will be observed, that, in our original proposition for this lock, the price, per foot lift, is 1050 dollars, which was reduced to the price stated herein, upon the express understanding that the stone could be obtained within the section whereon the lock is located, or within a distance not exceeding half a mile.

KNAPP, FORD, ACKER, and CHAPMAN.

Lock No. 6.

Articles of agreement entered into this fourth day of May, in the year 1829, between *between* Abram , Benjamin Ford, Henry Acker, and Fredus Chapman, of the town of Clyde, in the State of New York, of the one part, and the Chesapeake and Ohio Canal Company, by the president, pursuant to a resolution of the president and directors thereof, of the other part, witnesseth, that the said Knapp, Ford, Acker, and Chapman promise and agree, in conformity with the tenor of the annexed printed specification of locks of eight feet on the Chesapeake and Ohio canal, to construct on section, num sixty-eight of the said canal; lock, number twenty-six, in the survey, location, and distribution thereof for contract, the said lock to be of eight feet lift, and complete in all its parts and details, according to the said specification and such modifications thereof, as the engineer of the division, or the resident engineer of the residency of which such section is part, or superintendent of masonry, shall hereafter prescribe; the said lock to be completely finished in all its parts, and when so finished and approved by such engineer and superintendent, shall be paid for in thirty days thereafter, at Washington, at the rate of 983 75 dollars the foot lift; prices in the annexed specification, for excavating the lock-pit and embanking the lock, and any modification reducing or increasing the cost of said lock, shall cause a reasonable and fair deduction from, or addition to such sum, as the said engineer, or any other engineer deputed by the president and directors to act in his place, may judge. In order to prevent litigation, his judgment shall be final and conclusive in all cases of doubt occurring under this contract.

It is further agreed between the parties, that, in case the work upon the said lock shall not be commenced within ten days from this date, and thereafter steadily prosecuted, so as to insure its final conpletion by the thirty-first day of December, 1829, the president of the company shall have power to determine that this contract has been abandoned; and the company shall, in either event, be exonerated from every obligation thence arising; and the president and directors may immediately proceed to dispose of the lock in the same manner as if no such contract had ever been made

No sand or lime shall be mixed for mortar until each shall have been separately inspected and approved; nor any mixed for use but in the presence of one of the corps of engineers, who shall see that the proper proportions are observed. The engineer shall prescribe the manner of preserving the lime till it is required to be used, and of livigating the sand,

if it be impure, from mixture with clay or loam. He shall also prescribe the time such mortar may be kept after it has been made, and the mode of mixing it in making.

The lock walls shall be grouted at each course of facing stone, in the presence of one of the corps of engineers, who shall prescribe the composition of the grout; and no second course of stone shall be run upon any lock, till the course next before it and the grouting shall have been inspected by the engineer of division, of the residency or his assistant, or the superintendent of masonry At each of such inspections, every stone shall be liable to removal by the contractors, which shall not, in all respects, correspond with the terms of his contract, and be approved by the inspecting engineer or the superintendent of masonry.

The spoil bant or surplus earth shall be laid, with as much evenness and regularity, and with as little injury to the adjacent lands, as may be; provided that the contractor shall not be required to carry it more than 120 feet, with some additional allowance.

The acting resident engineer, or any member of the board of engineers, shall have power to prescribe the manner of preparing, for beginning, and conducting every species of work to be done under this agreement, with reference to its purpose, and to the durability of such work; and all instructions given by him shall be promptly obeyed by the said contractors.

The work shall be always open to examination during their progress, by the president and directors, their engineers, or any person they depute. Some competent engineer, in the employment of the president and directors, shall, from time to time, not less frequently than once a month, estimate the quantity and value of each species of work done pursuant to this contract, and any extra work done in consequence of any alteration of the line or plan of the canal, and determine every question necessary for the monthly, as well as the final settlement of every contract. His estimate shall be final and conclusive between the parties. Within ten days after the return of any estimate to the president and directors, not less than four-fifths of the sum appearing due, on any such estimate, shall be paid the contractor, in the mode in which all other payments are paid by the regulations of the company; the other fifth being retained or kept back, by the president and directors, until a final settlement with the contractor, to insure the fulfilment of his contract; provided, however, that when the allowance made, is for work done on moveable materials, a bill of sale from the contractors, to the company may be required, and shall, in that case, be executed at the time of any such payment.

At the expiration of every week's work, a report shall be made by the said contractors to the president, engineer, or to his assistant, upon the residency of which the said lock is a part, of the average force of hands, carts, &c., employed on the lock for the last past week, according to such forms as may be supplied by order of the president and directors of the company.

No payment shall be demanded of the company until this condition is particularly complied with.

The president of the company, the engineer of a division, or the engineer of the residency, may, at any time, require the said contractor to increase the force employed upon the lock, if, in his opinion, such augmentation be necessary to insure its completion in the stipulated time; and such requisition shall be promptly complied with.

No draft will be excepted by the president and directors from any con-

tractor, except under special circumstances, of which they shall be the exclusive judges.

No account will be kept by the president and directors with, nor payment made to, any sub-contractor; but for his acts or negligence, the original contractor, alone, will be held responsible in all cases whatever.

And the said Knapp, Ford, Acker, and Chapman promise and agree to finish the above work, and deliver up this contract, on or before the thirty-first day of December, in the year 1829.

If any contractor shall become notorious for bad temper, or shall be, himself, subject to intoxication, or shall allow drunkenness, or disorder, or violence among his hands, or any injury to be done by them, to the peace of the neighboring country, or to any property, or person within the vicinity of the canal; or having in his service the authors of any such violence, shall not promptly dismiss them when discovered; on such fact being proved, by the certificate of an engineer, or in any other satisfactory manner, to the president and directors, such contractor shall be, at their pleasure, discharged, and his contract considered abandoned, as in the case already mentioned.

When the contractors shall meet with any difficulty in purchasing, at a fair price, stone or other materials, they shall have the right of calling upon the president and directors of the company to cause the same to be assessed and condemed, in the mode provided by the charter of the company; the amount of such assessment and condemnation to be charged by the president and directors to the contractors for whose benefit such condemnation shall be made.

No person who has ever abandoned a contract entered into with the company, shall be a partner in this contract: should such a connexion be formed with the said Knapp, Ford, Acker, and Chapman, this contract shall thereupon become void.

In witness whereof, the said parties have hereunto set their hands and seals, the day and year first above mentioned.

Witness,
ROBERT BARNARD.

President of the Chesapeake and Ohio Canal Company, by order of the President and Directors, in behalf of the company.

KNAPP,
FORD,
ACKER, and
CHAPMAN. } [L. S]

C.

Report of Resident Engineer, referred to in B. Wright's answer to 7th cross interrogatory, at page 145.

J. P. INGLE, Esq.

I inclose a report made to me by the engineer on second residency, which, after showing to the board, pray return to me. I think, before any decision is made as to Ford and Chapman, or Fenlon, they ought to be seen, and a more particular inquiry made as to their preparation.

In haste, yours truly,
B. WRIGHT.

Nov. 4, 1829.

C.

President Engineer's Report referred to in B. Wright's answer to the seventh cross interrogatory at page one hundred and forty-five.

First Division, second Residency of the
CHESAPEAKE AND OHIO CANAL, *November* 3, 1829.

DEAR SIR: The following is a representation of the state of the several contracts embraced within this residency.

Section No. 7. R. A. Clements. The work at this section was lately resumed, and is progressing slowly, a large quantity of wall foundation should be laid in the river with as little delay as possible, as the water may soon be expected to rise, when this work will be rendered impracticable, and I am satisfied that the present contractor does not possess the ability, nor a disposition to execute the work as required. I hope to this section some attention will be given.

Section No. 8. W. W. Fenlon & Co. This section is in a state of forwardness, and, I think, will be completed within the time required.

Section No. 9. Charles Mourey. If prosecuted with the force which is now employed upon it, this section will be finished by the first of February next.

Section No. 10. Wade and Childs. Progressing in a very satisfactory manner.

Section No. 11. Latterly put under contract, the new contractor not yet commenced.

Section No. 12. George Ketchum. This section will be completed in due time, if prosecuted with the same vigor which is now evinced.

Section No. 13. Thomas B. Tripp. The force now employed on the part of this section retained by Mr. Tripp, gives evidence that it will be completed by the first of May next. The part of his section undertaken by A. P. Osborn, was commenced upon by him a few days ago, and will, I think, be completed by the time specified in the contract.

Section No. 14. Asher P. Osborn. This section is in a forward state, and can be finished with the force now employed in three months.

Section No. 15. Pannenio Adams. A small force employed on the part retained by Mr. Adams, but the contractor wholly disregard the orders of the engineers (in regard to the manner of conducting the work) very much to the prejudice of the company. Since the heavy embankment was let to Bargy & Co., Mr. Adams has placed hands at work upon that part of the section, and says he will be driven off before he will leave it.

Gillet and Tainter are diligently engaged upon the subdivision let to them, and are progressing reasonably well.

George Ketchum is engaged upon his subdivision of this section, and will probably finish it by the first of May next.

Bargy and Co., contractors for the heavy part of the embankment of this section, are making such preparations as to warrant the belief that they are competent to execute the work as they have agreed.

Section No. 16. Luke Hitchcock. This section is progresssing slowly, and if measures are not soon taken by the contractor to get forward more rapidly, it would seem advisable that such course be taken as will secure its completion by the required time.

Section No. 17. Henry Smith. This section is in a state which will warrant its completion in due time, if prosecuted with the usual means which have been and are now employed upon it.

Section No. 18. Daniel Rinner. The part retained by Mr. Rinner is progressing very slowly; when we consider the amount of work required to be done in a given time, more efficient means will be necessary to render probable its completion in due time.

Upper division of this section, new contractor latterly commenced, progressing reasonably well.

Locks No. 8, 15, 16, 17, 18, and 20. Knapp & Co. The work necessary to complete these locks by the time required would engage more than two hundred and fifty hands from this time to the first of May next. The present contractors have been engaged nearly a twelvemonth, and have performed little more than would complete one lock, leaving six months to do the work necessary to the construction of the remaining five. I am of opinion that no room is left to doubt that three of the six locks should be re-let with as little delay as possible, and placed in the hands of men, as contractors, who can be relied upon. As any further delay in this important part of the work would prove fatal to the wishes and expectations of the board.

Lock No. 9. W. W. Fenlon & Co. Nearly completed, will be finished this season.

Locks No. 12 and 19. Fenlon & Co. Lock No. 12. Such measures have been adopted by the contractors, as render the completion of this lock reasonably certain, within the time required. Lock No. 19. The contractors have made no commencement at any part of the work. I am of opinion that this look should be re-let, as the present contractors have as much work besides as, with every exertion, they will be able to finish by the first of May next.

Lock No. 13. Charles Mourey. No commencement has been made by the contractors for this lock.

Lock No. 14. Wood and Kendall. Work progressing in a very satisfactory manner.

Culverts.

Culvert on section No. 7. This culvert is in a state of forwardness, and will be completed within three weeks.

Culverts No. 10 and 12 on section No. 8. The culvert No. 12, at Rockey Run, is complete, and the contractors have commenced their work upon culvert No. 10, which will probably be finished with the present month.

Culvert on section No. 10. This culvert will probably be finished before the first of December next, it having been commenced upon a few days since.

Culvert on section No. 11. This culvert is nearly finished, will be completed within ten days.

Culvert on section No. 14. Completed.

Culvert on Section No. 15. The contractors are engaged in excavating the pit, which is exceedingly difficult, in consequence of which it is doubtful whether they will be able to complete the work this season. I have therefore recommended to them to procure and deliver at the place all the materials, and commence building as early in the spring *in* the season will admit. This course will secure its completion by the required time. All

of the other culverts upon this residency are in such a state as to warrant the belief that they will be finished within the present month.

It is to be hoped that prompt measures will be adopted by the board, in two or three of the most urgent cases, as I think the interest of the company is suffering for the want of such course.

Yours respectfully,

DANIEL VAN SLYKE,
Resident Engineer.

BENJAMIN WRIGHT, Esq.,
Engineer in Chief of the C. and O. Canal.

P. S.—Locks No. 10 and 11, for which Morgan, Kavenaugh & Co. are contractors, are in such a state of progress as to give satisfaction that they will be completed in due time.

D.

Report of condition of second residency, referred to in B. Wright's answer to seventh cross interrogatory, at page 145.

APRIL 7th, 1830.

GENTLEMEN—I inclose the within report from the engineer of the second residency. It will give the board a full view of this important residency.

Respectfully your obedient servant,

B. WRIGHT,
Engineer in Chief C. and O. Canal.

To the PRESIDENT and DIRECTORS
Of the Chesapeake and Ohio Canal.

D.

Statement showing the progress and present state of the work on the second residency of the Chesapeake and Ohio Canal, 7th April, 1830, *referred to as above, page* 145.

Section No. 7. The work on this section is in such a state of forwardness as to insure its completion in due time.

Section No. 8 can be finished in ten days, when the locks on the section are in such a state as to admit of its completion.

Section No. 9. Nearly completed.

Section No. 10. Much work remains to be done on this section, the contractors having neglected to employ the required force; this, however, is one of those sections, the situation of which is such as to admit of its being urged to completion in a short time, if requisite.

Section No. 11 will be completed by the first June next, with the force now engaged upon it.

Section 12. Much work remains to be done on this section, as much more rock than was expected appears on the east part of it. The contractor has given assurance that shall be done in due time, although the requisite force is not now engaged upon it.

Section No. 13. Three subdivisions having been made on this section, it seems that nothing more can be done to expedite the work than to require the contractors to employ the necessary force. This has been done, and still there remains doubts as to its being completed in due time.

Section No. 14. Completed, except trimming the banks.

Section No. 15. Gillet & Taintor's subdivision of this section will be finished early in May with the present force.

George Ketchum's subdivision of this section will be among the last of the work completed on the residency, the work being exceedingly heavy and difficult. The circumstance of its having been suffered to remain so long in the hands of Mr. Adams, when very little was done, and that of the difficulty with Mr. Offutt, with respect to the earth for embankment, have tended to delay this job, so that, with the utmost exertions, it will be late when it will be completed; yet I have less doubt about this than the locks.

Bargy & Rogers. The heavy embankment under contract to these gentlemen has been urged to a degree beyond that of any other work of the kind on the residency, and will be completed long before it will be possible to fill with water the ravine which this embankment dams.

Section No. 16. There no longer remains a doubt but that this section will be finished in due time, if the same force which is now employed be continued on it.

Section No. 17 is in a forward state, and will be finished in due time with the present force.

Section No. 18. The work on this section is progressing in a very satisfactory manner, notwithstanding which it will be among the last completed. That part of the work which was most important, as being necessary to admit of the lock contractors approaching their work, is now done; and every other part of the work on the section is particularly advancing.

Locks.

Locks No. 9, 11, 15, 16, and 20, as well as No. 13 and 14, are in a state of forwardness, which will warrant a full belief that they will be completed by the first of June next.

Lock No. 10, lately placed under contract to Douglass & Small, who have made every exertion to forward the work, and are taking measures which are likely to insure the completion of the lock as early as the 15th June next.

Yours respectfully,

DANIEL VAN SLYKE,

Resident Engineer.

BENJAMIN WRIGHT, Esq.,

Engineer in Chief of the C. and O. Canal Company.

WASHINGTON CITY, *April* 7, 1831.

GENTLEMEN: Take notice, that, on Saturday the 9th of April instant, at five o'clock P. M., at the clerk's office of the United States circuit court, for the county of Washington and District of Columbia, I shall proceed to take the deposition of Daniel Van Slyke, (who is about to leave the District of Columbia, and resides more than one hundred miles from the said District,) to be read in evidence in the case of Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, vs. the Chesapeake and Ohio Canal Company, now pending in the United States circuit court, for the county of Washington, in the District of Columbia, in which you are attorneys for

plaintiffs. You are notified to be present at the taking of the deposition of said Van Slyke, and to put interrogatories to said Van Slyke if you think fit.

W. CRANCH,
Chief Judge of District Columbia.

Messrs. KEY and DUNLAP.

April 7th, 1831.

This notice was this day served on us, but we object, and say it ought to be served on the plaintiffs, who reside at Harper's Ferry, with whom there is not time for us to communicate before the day fixed.

KEY & DUNLAP.

April 7th, 1831, ½ *past* 12 *o'clock.*

ABRAHAM KNAPP, BENJAMIN FORD, HENRY ACKER & FREDUS CHAPMAN,
vs.
The CHESAPEAKE AND OHIO CANAL COMPANY.

The deposition of Daniel Van Slyke, of lawful age, a witness produced on the part of the Chesapeake and Ohio Canal Company, in an action depending in the circuit court of the District of Columbia, for the county of Washington, in the said District, in which Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, are plaintiffs, against the Chesapeake and Ohio Canal Company, defendants.

The said Daniel Van Slyke being first, by me, William Cranch, chief judge of the District of Columbia, carefully examined and cautioned, and sworn to testify the whole truth, deposed and said:

That the plaintiffs contracted with the defendants to construct six locks on the Chesapeake and Ohio canal, (in the second residency of that canal,) designated by the numbers 8, 15, 16, 17, 18, and 20, the witness at that time being the resident engineer of that residency, which office he held from August, 1828, to October, 1830; during which time those locks were constructed by the plaintiffs. That, during the progress of that work, and generally once every month, during such progress, estimates were made by the witness of the quantity and value of the work, from time to time, according to the terms of the contract between the plaintiffs and the defendants, and that the papers now exhibited, and marked No. 1, No. 2, No. 3, No. 4, No. 5 and No. 6, (copied in pages ,) are the final estimates made by the witness at or near the completion of the work. That the said estimates are true and just, according the best of his skill and knowledge, and contain a true account of the quantity and value of the work done by the plaintiffs upon the said locks, estimated according to the terms of their contract. That those estimates were made a month or more before the water was let into the said locks. That the sufficiency of the workmanship of locks cannot be well ascertained until the water is let in; and that it is usual to retain a part of the contract price for constructing locks until their sufficiency shall have been tested by letting in the water. That the said locks were not entirely completed when those estimates were made; and the said locks were never formally approved by the witness, nor by any other engineer, to his knowledge or belief, after the work was finished by the plaintiffs. No modification, reducing or increasing the cost of the said locks, was made by the

directions of the witness; but some such were made under the direction of other engineers.

That the paper now here exhibited, marked No. 7, (copied in page 203) contains the joint report of the witness and two other engineers, to wit: Nathan S. Roberts and Alfred Cruger, respecting the manner in which the work was executed by the plaintiffs under their said contract, including the modification aforesaid; and that the facts stated in the said report, as of the knowledge of the witness or of the other two engineers who joined in the said report, are true.

That the paper now here exhibited and marked *No.* 8, (copied in page 208) is a correct estimate made by this witness of the effect of those modifications upon the contract price of the said work, taking into consideration those modifications, which were to the disadvantage, as well as to those which were to the advantage, of the plaintiffs.

That there were some alleged modifications in the execution of the work, which were stated by the plaintiffs as being to their disadvantage, which were not considered in making the aforesaid estimate No. 8.

That some of those modifications, or claims of the plaintiffs are noticed in the aforesaid report, marked *No.* 7, and that they were not taken into the estimate marked No. 8, because this witness did not understand them as coming under the contract, but as claims to be submitted to the decision of the board of directors.

That one instance of such claim was, that respecting part of the stone used in the culverts of the locks, noticed in the report marked *No.* 7, where the plaintiffs claimed allowance for procuring stones, which were afterwards rejected by the president of the company, alleging that they were authorized by the engineer in chief to use them.

That this witness does not know that the engineer in chief gave an original order for the use of those stones; but, that he does know, approved the use of them.

That the paper now here exhibited, marked *No.* 9, is a report made by this witness upon the subject of that stone thus used in the culverts, and that the facts therein stated, as of the knowledge of this witness are true, and that the estimates therein by him made, are just and correct, according to the best of his skill and knowledge.

That the papers now here exhibited, marked No. 10 and No. 11, contain reports made by this witness in his official character of engineer of the second residency, in relation to such of the claims made by the plaintiffs, as were referred to him by the defendants.

That, in relation to all the papers, so as aforesaid here exhibited and referred to, the facts therein stated as of the knowledge of this witness, are true, and that all the statements and estimates therein made, were made by him in his official character as resident engineer, and are just and correct, according to his best skill and knowledge.

In answer to a question by Mr. J. Dunlap, counsel for the plaintiffs, the witness says, that the quantity of cement and face hewn stone, and all other materials necessary in the construction, each lock was made by the witness under the direction of the engineer in chief, but he does not know that it was ever shown to the plaintiffs, or any of them, until the first estimate was made of work done by the plaintiffs.

Question by plaintiff's counsel. Does, or does not, the actual value of the work done by the plaintiffs on those locks, exceed the price they have been paid therefor?

Answer. I think it does considerably.

Question by the defendants' counsel. Was, or was not, the work badly done, and did not the plaintiffs neglect it?

Answer. My opinion on that subject is fully expressed in the papers already referred to.

Question by the defendants' counsel. Were the streatchers in the facing of the locks so cut that the ends made an even joint with the ends of the adjacent stones, of twelve inches throughout?

Answer. They were not. In general, they fell short considerably.

Question by the plaintiffs' counsel. Do you not expect to return to this district soon after your contemplated absence, and when?

Answer. I expect to return in about forty days, and am still in the employment of the defendants.

DANIEL VAN SLYKE.

The above deposition was taken by me at the time and place mentioned in the annexed notice, in the presence of the counsel of the plaintiffs; it is in my hand writing, and signed by the witness in my presence; the reason of taking it is, that the deponent is about to go out of this district, and to a greater distance therefrom than one hundred miles.

W. CRANCH.

DISTRICT OF COLUMBIA, to wit:

I, William Cranch, chief judge of the circuit court of the District of Columbia, certify, that the annexed deposition of Daniel Van Slyke, &c.

(Mem. The counsel for the parties on both sides agreed to dispense with the formal parts of the certificate.)

The president of the Canal Company, Gen'l Mercer, and his counsel, Mr. R. S. Coxe, and one of the plaintiffs, (I believe Mr. Chapman,) and their counsel, Messrs. Key, Dunlap, and Redin, were present at the taking of the deposition, at the clerk's office of the circuit court in Washington county, on Saturday, April 9th, 1831; that the witness was about to go out of this district, and to a greater distance than one hundred miles from the place of trial. The testimony of the witness was reduced by me to writing, in the presence of the witness and of the parties, and was, by the witness, subscribed in my presence.

The annexed notice was issued by me, and returned with acknowledgment of service, as appears upon the back thereof. I am not of counsel or attorney to either of the parties, nor interested in the event of the cause.

Witness my hand, this 9th day of April, 1831.

W. CRANCH

Final Estimate, No. 1, *referred to in Van Slyke's Deposition* (*Page* 191.)

First division, second residency, of the Chesapeake and Ohio canal, 27th July, 1830; lock No. 8, 8 feet lift. Knapp, Ford, and Chapman, contractors.

Lock completed, as per contract and specification, at $1,048 per foot lift - - -	$8,384 00
1,612 cubic yards excavation of earth in pit, 17 cents -	274 04

1,344 cubic yards embankment around lock, 25 cents		336 00
		$8,994 04
Deduct for flume required by contract and not constructed	$200 00	
Deduct for 107 feet locust timber, at 50 cents	53 50	253 50
		$8,746 54
Deduct off sum heretofore estimated on locks, Nos. 8, 15, 16, 17, 18, 20		6,886 41
		$1,854 13

The above lock is completed, the several items, as stated, are correct, and the prices annexed are those which, according to the terms of the contract, properly apply.

DANIEL VAN SLYKE, *Resident Engineer.*

To the PRESIDENT and DIRECTORS
of the Chesapeake and Ohio Canal Company.

Total estimate as above	$8,794 04
Deduct, as recommended by engineer	101 47
	$8,692 57
Add, as recommended by engineer	40 40
	8,732 97
Deduct estimate of June	6,886 41
	$1,846 56

Final Estimate, No. 2, referred to in Van Slyke's deposition, (Page 191.)

First division, second residency, of the Chesapeake and Ohio canal, 27th July, 1830; lock number fifteen, 8 feet lift. Knapp, Ford, and Chapman, contractors.

Lock completed, as per contract and specification, at $1,055 per foot lift		$8,440 00
207 cubic yards excavation of hardpan in lock pit, 30 cents	$62 10	
8573 cubic yards rock blasted, 11 cents	8 57	919 10
208 perches vertical wall, to sustain embankment, 50 cents	$104 00	
193 perches of stone, not excavated, $1 25	241 25	345 25
		$10,456 60

Deduct for flume required by contract and not constructed - - - - -	$200 00	
Deduct for 107 feet of locust timber, at 50 cts. -	53 50	
		253 50
		10,183 10
Deduct off estimate heretofore made on locks Nos. 18, 15, 16, 17, 18, and 20 - - -		6,886 42
		$3,296 68

The above lock is completed, the several items, as stated, are correct, and the prices annexed are those which, according to the terms of the contract, properly apply.

DANIEL VANSLYKE, *Resident Engineer.*

To the PRESIDENT and DIRECTORS
of the Chesapeake and Ohio Canal Company.

Total, estimated as above - - -	$10,236 60
Deduct, per recommendation of engineer -	123 67
	10,112 93
Add, per recommendation of engineer -	236 90
	10,349 82
Deduct, estimate of June - - -	6,886 42
	$3,463 41

Final Estimate, No. 3, referred to in Van Slyke's deposition, (Page 191,)

First division, second residency, of the Chesapeake and Ohio canal, 27th July, 1830; lock No. 16, 8 feet lift. Knapp, Ford, and Chapman, contractors.

Lock, completed as per contract and specification, at $1,055 per foot lift - - - -		$8,440 00
210 cubic yards excavation of earth in lock pit, 17 cts. - - - - -	$35 70	
312 " " hard pan, at 30 cts. -	93 60	
346 " " rock not blasted, at 40 cts. -	138 40	
508 " " rock blasted, at $1 - -	508 00	
		775 70
130 perches vertical walling, to sustain embankment, at 50 cts. - - - - -	65 00	
183 ditto of stone not excavated from pit, at $1 25	228 75	
		293 75
1,905 cubic yards embankment around lock, at 25 cts. - - - - -		476 25
		$9,985 70
Deduct for flume required by contract, and not constructed - - - - -	$200 00	

Deduct for 107 feet locust timber, at 50 cts. -	53 50	
		253 50
		9,732 20
Deduct off sum heretofore estimated, on locks Nos. 8, 15, 16, 17, 18, and 20 - - -		6,886 42
		$2,845 78

The above lock is completed, the several items, as stated, are correct, and the prices annexed are those which, according to the terms of the contract, properly apply.

DANIEL VAN SLYKE, *Resident Engineer.*

To the PRESIDENT and DIRECTORS
of the Chesapeake and Ohio Canal Company.

Total estimate as above - - -	$9,785 70
Deduct, per recommendation of engineer -	101 47
	9,684 23
Add " " " -	317 55
	10,001 78
Deduct estimate of June - - -	6,886 42
	$3,115 36

Final Estimate, No. 4, *referred to in Van Slyke's deposition,* (*Page* 191.)

First division, second residency, of the Chesapeake and Ohio canal, 27th July, 1830; lock No. 17, 8 feet lift. Knapp, Ford, and Chapman, contractors.

Lock completed, as per contract and specification, at $1,100 per foot lift - - - -		$8,800 00
927 cubic yards excavation of rock blasted in pit, at 75 cts. - - - - -		694 50
437 perches external vertical wall, to support embankment, at 50 cts. - - - -	$218 50	
1,092 " of stone, not excavated from pit, $1 25 - - - - -	1,365 00	
		1,583 50
933 cubic yards embankment, at 28 cts. - -		261 24
		11,339 24
Deduct for fume required by contract, not constructed - - - -	200 00	
Deduct for 107 feet of locust timber, at 50 cts. -	53 50	
		253 50
		11,085 74

Deduct off fume heretofore estimated, on locks 8, 15, 16, 17, 18, and 20 - - - -		6,886 42
		4,199 32
Deduct off embankment, not constructed, 487 cubic yards, at 28 cts. - - - -		136 36
		$4,062 96

The above lock is completed, the several items, as stated, are correct, and the prices annexed are those which, according to the terms of the contract, properly apply.

DANIEL VAN SLYKE, *Resident Engineer.*

To the PRESIDENT and DIRECTORS
of the Chesapeake and Ohio Canal Company.

Total estimate as above - - -		$11,139 24
Deduct, embankment not erected -	$136 36	
Also for sundries, per recommendation of engineer - - - -	101 47	
		237 83
		10,901 41
Add, per recommendation of engineer -		40 40
		10,941 41
Deduct estimate of June - -		6,886 42
		$4,055 39

Final Estimate, No. 5, referred to in Van Slyke's deposition, (Page 191.)

First division, second residency, of the Chesapeake and Ohio canal, 27th July, 1830; lock No. 18, 8 feet lift. Knapp, Ford, and Chapman, contractors.

Lock completed, as per contract and specification, at $1,055 per foot lift - - - -		$8,440 00
688 cubic yards excavation rock blasted in lock pit, at $1 - - - - - -		688 00
130 " hard pan, at 30 cts. - -		39 00
1,342 " embankment round lock, at 25 cts.		335 50
		9,502 50
Deduct for flume required by contract, not constructed - - - - -	$200 00	
Deduct for 107 feet locust timber, at 50 cts. -	53 50	
		253 50
		9,249 00

Deduct off estimate heretofore made on locks, Nos. 8, 15, 16, 17, 18, and 20 - - -	6,886 42
	$2,362 58

The above lock is completed, the several items, as stated, are correct, and the prices annexed are those which, according to the terms of the contract, properly apply.

DANIEL VAN SLYKE, *Resident Engineer.*

To the PRESIDENT and DIRECTORS
of the Chesapeake and Ohio Canal Company.

Total estimate as above - - -		$9,302 50
Deduct, as recommended by the engineer -		101 47
		9,201 03
Add, " " " - -		40 40
		9,241 43
Deduct, estimate of June - - -		6,886 42
		$2,355 01

Final Estimate, No. 6, referred to in Van Slyke's deposition, (Page 191.)

First division, second residency, of the Chesapeake and Ohio canal, 27th July, 1830; lock No. 20, 8 feet lift. Knapp, Ford, and Chapman, contractors.

Lock completed, as per contract and specification, at $1,050 per foot lift - - - -		$8,400 00
135 cubit yards excavated of earth in lock pit, at 15 cts. - - - - - -		20 25
156 " " " hard pan, at 25 cts. -		39 00
556 " " " rock blasted, at 97 cts. -		539 32
2,371 cubic yards embankment round lock 25 cts.		592 75
		9,591 32
Deduct for flume required by contract, and not constructed - - - - -	$200 00	
Deduct for 107 feet locust timber, at 50 cts. -	53 50	
		253 50
		9,327 82
Deduct off sum heretofore estimated on locks, Nos. 8, 15, 16, 17, 18, and 20 - . -		6,886 42
		$2,451 40

The above lock is completed, the several items, as stated, are correct, and the prices annexed are those which, according to terms of the contract, properly apply. DANIEL VAN SLYKE, *Resident Engineer.*

To the PRESIDENT and DIRECTORS
of the Chesapeake and Ohio Canal Company.

Total estimate as above - - -	$9,391 32
Deduct for sundries, as recommended by engineer - - - - -	76 20
	9,315 12
Add " " " - -	40 40
	9,355 52
Deduct estimate of June - - -	6,886 42
	$2,469 10

No. 7. Referred to in Van Slyke's deposition, (Page 192.)

To the PRESIDENT and DIRECTORS
of the Chesapeake and Ohio Canal Company.

The engineers, to whom a reference was made of the letter of Ford and Chapman, requesting an examination of their locks, have examined the work, and respectfully present the following report:

Lock, No. 8. The second flooring of plank in this lock is put down without jointing. The first floor was well laid.

The gates of this lock are constructed according to contract, except that one of the balance beams is of pine timber, instead of white oak, as required by the specifications.

The stone work of this lock appears to be substantial, the joints well broken, and every appearance of being a tight lock, although the resident engineer is of opinion that the masonry is inferior to that of the other locks built by the same contractors.

The breast wall of this and all of the other locks, constructed by these contractors, is eight feet thick, instead of six, (which is according to the specification.) The contractors say this additional wall (640 perches in each lock) was laid by order of the engineer in chief.

The resident engineer says he has no knowledge of any such order having been given.

Lock, No. 15. This lock is built on a rock foundation, the rock being very uneven on the surface; 245 perches of solid masonry, laid in cement, was required to raise the foundation to the proper level of the lock bottom.

The engineers are, therefore, of opinion that any expense incurred by the contractors, beyond the cost of a timber and plank foundation, is a fair charge as extra work, as this was expected to be rock, and these foundations generally cost less, by about $500, than one of timber and plank; therefore, it is considered, that the most the contractors ought to expend under the contract, on a foundation, is the cost of the most expensive foundation contemplated.

Lock No. 16. The foundation of this lock is similar to that of No. 15, only that it is represented by the resident engineer as being insecure without a pavement in the bottom, between the walls, for the whole length of the lock, from the breast to the extreme lower end.

The reason that this has not been done, is, that the engineer in chief, in a letter to the president, expressed a wish that it might not be done until the water is let into the canal.

Lock No. 17. The foundation of this lock is rock, and 169 perches of masonry laid in cement was necessary to level the foundation; this quantity of masonry, at $3 50 per perch, which is deemed a reasonable price, amounts to $591 50, a sum considerably short of the cost of a foundation of timber and plank; on this, therefore, it is not deemed proper that any extra allowance be made.

Lock No. 18. The foundation of this lock is rock, although 94 perches of solid masonry was required to level the bottom. The coping of this lock is but ten inches in thickness, instead of twelve inches, as required by contract, although the same appears to be of good quality of workmanship.

Lock No. 20. The foundation on rock, and favorably situated.

General remarks.

The contractors charge for bailing and pumping, in foundations of locks No. 15, 16, 18, and 20, as follows:—

Lock No. 15, - -	$188
" " 16, - -	173
" " 20, - -	53
" " 18, - -	87
	501
Deduct on lock 18, which the engineer thinks improper, - - - - -	87
Leaving a proper charge, - -	$414

This sum of four hundred and fourteen dollars is deemed reasonable if the board acknowledge the principle of paying for bailing water in *ordinary cases.*

The plan of the paddle gates was changed after the lock contracts were entered into, by which change from wood, to cast iron, the cost is increased $18, the sum is justly due to the contractors beyond the contract price.

The lock embankments are in some cases deficient. The engineer has estimated only the quantity made, the remainder has been some cases done by the contractors for the section on which the locks are situated, and in one case, much of the embankment remains to bedone at an expense exceeding the contract price of Ford and Chapman. The contractors say that this omission was sanctioned by the engineer in chief, and that something else was to be substituted for this embankment.

Lock gates. The gates are tolerably well constructed, the hanging and fitting in the hollow quoins and on the mitre sills, requires the particular attention of some faithful person, as the gates in the present state are so imperfectly hung as to be very objectionable on this account. Some additional spikes are still required in the planking of some of the gates.

Masonry of the locks. The stone are roughly cut in the lower six feet of the face wall. The resident engineer says, that much of the stone used in the construction of the lock culverts, does not conform to the specification or instructions being laid, (as it is termed,) bastard fashion; that is, when the natural bed of the stone is made the face as laid in the work; for this deviation from the original instructions, the contractors say they have the authority of the engineer in chief, and for stone procured under this au-

thority, and afterwards positively rejected by the president of the company, the contractors claim renumeration. Their statement on this subject we transmit to the board. In other respects the masonry is believed to be good, the courses of face stone are heavy, and appear to be well laid, some pointing of the joints of the face stone with cement is still required to make the masonry complete.

A considerable portion of the irons for the lock gates required by the plan and specification, have been dispensed with by an order of the engineer in chief, not, however, until the irons had been furnished by the contractors; on this account, therefore, it is thought no deduction should be made, but that the irons thus furnished and not used should be considered the property of the company.

A part of the timber and plank of the flooring above the breast of the locks has been dispensed with, for which a proper deduction should be made.

In consequence of the unfinished state of the work and of the probability of the existence of some invisible defects which cannot be discovered until the water is let into the canal, the engineers recommend that the sum of $50 be retained for the present on each lock, on more reflection it is considered that the $50 above mentioned should be retained in consequence of the unfinished state of the work, and any deduction to be made until the locks are tested by the water, may be considered by the board or governed by the engineer in chief, he having given an opinion on this subject.

The above statements, together with the accompanying account having carefully drawn up by the resident engineer, and reviewed by us, we take the liberty to present the same to the board of president and directors.

Respectfully submitted,

NATHAN S. ROBERTS,
DANIEL VAN SLYKE,
ALFRED CRUGER,
Civil Engineers.

August 28th, 1830.

Statement No. 8. Referred to in Van Slyke's deposition, page 193.

Statement exhibiting the modifications which have been made the work under the contract of Messrs. Knapp, Ford, and Chapman, for locks No. 8, 15, 16, 17, 18, and 20, with the reductions which are considered proper, in consequence of such modifications, as well as the extra work and increase of cost incurred thereby.

Proper reductions.		Extras and increase.	
Lock No. 8.			
Plank and timber above the breast dispensed with	$25 27½	640 perches additional masonry in breast wall, $3 50	$22 40
Cutting stone dispensed with in lower 6 feet of face walls, 1,524 feet, at 5 cents	76 20	Additional cost of cast iron paddle gates	18 00
	101 47½		40 40
Lock No. 15.			
Plank and timber above the breast dispensed with	25 27½	640 perches additional masonry in breast walls, $3 50	22 40
Cutting stone dispensed with in the lower 6 feet of the face walls, 1,524 feet, at 5 cents	76 20	Additional cost of cast iron paddle gates	18 00
Additional cost of 5 cents per yard on 444 cubic yards of embankment required, which contractors refused to construct	22 20	Expense of foundation of masonry exceeding one of timber and plank	196 50
Contract price 25 cents, cost of the 440 yards believed to be 30 cents			236 90
	123 67½		
Lock No. 16.			
Plank and timber and culling stone dispensed with, same as above	$101 47½	Additional on breast wall and paddle gates same as above	40 40
		Expense of foundation exceeding one of timber and plank	277 15
			$317 55

53—13

STATEMENT—Continued.

Proper reductions.		Extras and increase.	
Lock No. 17.			
Plank and timber above breast dispensed with - -	$25 27½	640 perches additional masonry in breast wall, at $3 50 -	$22 40
Cutting stone for lower 6 feet of face walls dispensed with, 1,524 feet, at 5 cts. - - - - -	76 20	Additional cost of cast iron paddle gates - - -	18 00
	101 47½		40 40
Lock No. 18.			
Same reductions as on lock 17 - - - -	101 47½	Same increase as on lock 17 - - - -	40 40
Lock No. 20.			
Same reduction for cutting stone dispensed with - -	76 20	Same increase as above - - - - -	04 40
Aggregate of the reductions upon the six locks - -	$605 77½	Aggregate of extras and increase on the six locks -	708 05
		Deduct reductions - - - - -	605 77½
		Balance in favor of contractors - - - -	102 27½
		Bailing and pumping - - - - -	414 00
			$516 27½

With regard to the rough cutting of the stone in the lower five feet of seven of these locks, Mr. Roberts would observe that he was present when liberty was given to dress the first five feet in this manner, and that no deduction was then expected to be made on that account, as it was expressly enjoined that the beds and vertical joints should all be cut in the best manner, which, as far as he observed, was done.

In relation to the above five feet of stone in the lock, not cut but scabbled, the contract contains a clause which says, that any modification, increasing or reducing the cost of the work, shall be considered by the engineer, and his estimate shall be final and conclusive. If the contractors were allowed, by a proper authority, to substitue scabbled for cut stone, then it is to be considered a privilege, and no reduction to be made; if not, I consider the charge of five cents per foot a correct one, and called for by the contract.

ALFRED CRUGER.

I concur in the above statement made by Mr. Cruger.

DANIEL VAN SLYKE.

No. 9, referred to in the deposition of D. Van Slyke, (page .)

October 22, 1830.

GENTLEMEN: Of the 4th and 5th charges of the account of Ford & Chapman, I consider myself well informed, except on one point, that is, whether the stone, procured by them for the lock culverts, and afterwards rejected, were ever ordered or sanctioned by the engineer in chief; stone of a quality which was disproved by me, was furnished by these contractors to a considerable extent; and, if ordered by the engineer in chief, I believe ought to be paid for to the extent of the damage sustained, which, in my opinion, cannot exceed fifty dollars, as the stone, although rejected for a specific purpose, were used in other parts of the lock, for very little of it remained when the work was finished. The only stone used in a culvert, and which belonged to Ford & Chapman, was that by Bargy & Co. in the construction of the works for admitting the water from the feeder into the canal, and this by agreement between the parties; and Bargy & Co.; have paid, or hold themselves bound to pay, for this. With respect to Gen. Mercer's countermanding the order of Judge Wright, as being the means of this loss, I have to say that the contractors persisted in using this stone, contrary to my direct order, pleading that they had the authority of the engineer in chief; on this occasion I appealed to the president of the company, then on the work, who ordered the contractors to remove the stone from the work, which were of the objectionable kind; and, on the observation from the contractors that it was approved by Judge Wright, it was remarked, on the part of the president, that it was a direct violation of the contract, and therefore could not be permitted. The stone *was* removed.

Having been requested by the president to ascertain, as far as practicable, whether the board of masons and laborers was paid when idle for want of cement, I answer, that I can learn of none having been paid. Mr. Roberts, who boarded men engaged on the locks, says, none boarded with him during the time when they were idle from this cause, but says they were at this time with Mr. Love, who, as a sub-contractor, says he has never been

paid, nor received a promise of payment, for losses of any kind sustained from this detention.

Respectfully submitted.

DANIEL VAN SLYKE,
Late resident Engineer, second Residency,
Chesapeake and Ohio Canal.

To the PRESIDENT and DIRECTORS
Of the Chesapeake and Ohio Canal Company.

No. 10, referred to in Van Slyke's deposition, (page .)

FIRST DIVISION OF THE CHESAPEAKE AND OHIO CANAL,
October 15, 1830.

GENTLEMEN: I have considered the charges from the account of Ford and Chapman, referred to me for my opinion thereon, which I give, and with it such information as, in the course of the investigation, has come to my knowledge, touching the transactions of these gentlemen, wherein the welfare of the company is concerned, and which it might be deemed remiss in me to withhold.

Charges Nos. 14 to 19 inclusive, are for "damages sustained in consequence of the company not having furnished the cement agreeably to their engagements for locks Nos. 17, 18 and 20."

I believe it is acceded that the only claim which the contractors have on this account is founded in equity. It seems proper, therefore, that it should be so considered.

The masonry of these locks was laid under sub-contract, the former by Butters & Randall, and to two latter by Robert Love & Co., all at rates not exceeding those paid by the company; consequently, any damage sustained was by these persons, and not by the contractors, who have never paid for this delay, nor yet promised to make any remuneration therefor, as I am informed, and verily believe.

As to the extent of the damages, I am of opinion that, instead of $2,202. 17, as charged, a fair allowance would be $300, or $100 on each lock. In this the persons damaged do not materially differ with me.

The remainder of the charges are for like damages on lock No. 5, which, being on the first residency, I am unqualified to judge of the merits of the claim.

Respectfully submitted.

DANIEL VAN SLYKE,
Late resident Engineer, second Residency.

To the PRESIDENT and DIRECTORS
Of the Chesapeake and Ohio Canal Company.

No. 11, referred to in Van Slyke's deposition, page .)

The wing walls of the locks of Ford & Chapman, on the second residency, were laid four feet wide, which was not before mentioned by me, because I did not deem it a proper extra charge under the contract; and, instead of twelve perches, as charged by the contractors, the actual quantity is 9.90 perches in each lock.

With respect to the expenses incurred by me, in fitting their locks for use, I have to remark that these expenses are not fully paid, and cannot now

be fully ascertained, as I have latterly discovered some deceptions, which are of such character as to induce the belief that further and perhaps more serious frauds may yet be detected. Those to which I refer are the air holes over the culverts, which were required by contract, only one of which was originally made; and two more being required over each culvert, the contractors sent a person to accomplish this work; and I find, on examination, that the holes are not made through into the culvert, but into the coping only a few inches, to give the appearance of effectual work. Another instance is, that some of the bolts, intended to secure the irons on the lock gates, being perhaps too long, or that the bolts, being round instead of square, as all screw bolts ought to be, rendered it difficult to screw on the nut, to obviate which the bolts were cut in the centre, and the nut having been put on the two ends of the bolt, driven in from the opposite sides of the gate, this giving the appearance of good and faithful work. These instances induce me to recommend that the sum hereto recommended be still retained.

Respectfully submitted.

DANIEL VAN SLYKE,
Late resident Engineer.

To the PRESIDENT and DIRECTORS
Of the Chesapeake and Ohio Canal Company.

Resolution of the Board of Directors of the Canal Company, dated January 20, 1830, referred to in defendant's exception, (page 218.)

The president and directors, in meeting, January 20, 1830,

Resolved, That although this board has stipulated to supply the contractors with water lime, yet the board will not be held responsible for any damages arising from the want of that article.

Extract from the journal.

Test: JNO. P. INGLE,
Clerk C. & O. C. C.

Verdict of the Jury—Damages—Interest.

Whereupon, for trying the issue aforesaid, it is ordered by the court here, that twenty persons from the pannel of petit jurors, returned to the court here by the marshal of the District of Columbia, for the county of Washington, be drawn by ballot, according to law; and, thereupon, the twenty persons being so drawn by ballot, and written upon two lists, one of which said lists is delivered to the counsel for the respective parties, and the counsel for each of the said parties, having stricken out four persons from the said lists, thereupon the remaining twelve persons so drawn being called, come, to wit: Edward Fenwick, W. H. Perkins, Samuel Stetinius, Wallis Kirkwood, Nathaniel Brady, Peter Little, sr., James Friend, Samuel Drury, Paul Stevens, James Summers, James Owens, and Abner H. Young, who, being empannelled and sworn to say the truth in the premises, upon their oath do say, that the said defendants did assume upon themselves, in manner and form as the aforesaid plaintiffs, within against them, have complained, and they assess the damages of the said plaintiffs, suffered by occasion of the non-performance of the promise and assumption aforesaid, to the sum of twenty thousand seven hundred and

seven dollars and fifty-six cents, current money, with interest from first September, in the year of our Lord eighteen hundred and thirty.

Judgment of the Court.

Therefore, it is considered by the court here, that the aforesaid plaintiffs recover against the said defendants, the sum of twenty thousand seven hundred and seven dollars and fifty-six cents, current money, with interest as aforesaid, by the jurors aforesaid, in form aforesaid assessed, to be sustained by occasion of the promise and assumption aforesaid, as the sum of by the court here unto them, the said plaintiffs, on their assent adjudged, for their costs and charges by them about their suit in this behalf laid out and expended; and the said defendants, in mercy, &c.

Memorandum. Before the jurors aforesaid withdrew from the bar of the court here, the said defendants, by their attornies aforesaid, filed in court here the following bills of exceptions, to wit:

Defendants' Exception—(Instructions as to payment of hands.)

In the further trial of this cause, and after the evidence and instructions stated in the preceding bills of exceptions had been given, and after evidence offered by the plaintiffs, of the payment of moneys to the laborers for the time during the detention occasioned by the want of cement on locks 5 and 6, the plaintiffs, by their counsel, prayed the court to instruct the jury, that if the jury believe, from the said evidence, that the defendants had on the 1829, and from that time till the day of January, 1830, contracted with the plaintiffs to furnish them with cement necessary, &c., in due time, &c., and that the plaintiffs, expecting that sufficient supplies of cement to go on with the work would be furnished by the defendants, as defendants had so engaged to do, hired a large number of hands, and brought them to the locks, and when the defendants had so failed to furnish the cement, kept the same hands idle, waiting for cement, on the defendants, desire that they should do so in order to be ready to go on with the work; and paid them their wages, while so waiting; then the plaintiffs are entitled, under the court, for money laid out and expended, contained in this declaration to recover the money so paid to said hands, during such periods. But that the plaintiffs are not entitled to recover for wages paid to their workmen on account of a deficiency of cement after the said day of January 1830, unless the jury shall be satisfied by the said evidence that the said resolution of the board of directors, of the 20th day of January, 1830, (copied in page 235,) was rescinded by the said board, and a new contract entered into thereafter by the defendants to furnish cement to the plaintiffs, and the subsequent failure on their prart so to furnish it, and an agreement also to pay for the wages of the plaintiffs' workmen, while so waiting, and so forth.

Which instruction the court gave, to which the defendants except, and pray the court to sign and seal this bill of exception, which is done accordingly, this day of in the year 1834.

W. CRANCH, [SEAL.]
JAMES S. MORSELL. [SEAL.]

Plaintiffs' first bill of exceptions.

The plaintiffs, having offered and read in evidence, the deposition of Benjamin Wright, in the trial of this cause, the defendant produced and read, in evidence, the deposition of the same Benjamin Wright, crosse xamined by defendants; and the plaintiffs, by their counsel, objected to the reading of the answer, to the second interrogatory of the defendants, in said deposition, as inadmissible evidence (copied in page ,) but the court considered the same as competent evidence, and overruled the plaintiffs' said objection; and the same was, thereupon, read to the jury, to which decision, and the admission of such answer in evidence, the plaintiffs except, and pray the court to sign and seal this, his bill of exceptions; which is done accordingly, this twentieth day of May, A. D, 1834.

Witness, our hands and seals,

W. CRANCH. [SEAL.]
B. THRUSTON. [SEAL.]

Plaintiffs' second bill of exceptions.

In the further trial of this cause, and after the plaintiffs' counsel had begun to read the deposition of Benjamin Wright, and after the defendants' counsel had objected to the reading of that part of the deponent's answer to the thirteenth interrogatory of the plaintiffs, that related to the acts or agreement, or proceedings of the committee therein mentioned, and after the court had rejected, as inadmissible, all the latter part of the said answer, which begins with the words "deponent further saith, that, at the said meeting, it was understood and agreed," &c.; and the plaintiffs' counsel had stated, that they would, thereupon, suspend the offer to read such part of said answer, until they should offer other evidence to render the same admissible, and before such other evidence had been offered by the plaintiffs, the defendants offered in evidence their cross-examination of said witness, contained in his deposition, and proceeded to read the same; and, on coming to the ninth interrogatory, stated that that question, and the answer thereto, would be omitted in the reading of said deposition.

But the plaintiffs' counsel objected to said omission, and insisted that the defendants' counsel should read in evidence the said question and answer, and that it was not competent for the defendants' counsel to withhold the same, or, that the plaintiffs' counsel should be allowed to read the same to the jury. But the court were of opinion, that it was competent for the defendants' counsel to withhold said question and answer, and read the rest of the deposition not objected to, and that it was not competent for the plaintiffs' counsel to read the same question and answer, in evidence, to the jury; to which opinion and decision of the court, and to their refusal to allow the said question and answer to be read, the plaintiffs, by their counsel, except, and pray the court to sign and seal this bill of exception; which is done accordingly, this twenty-first May, 1833.

W. CRANCH. [SEAL.]
B. THRUSTON. [SEAL.]
JAMES S. MORSELL. [SEAL.]

Plaintiffs' third exception.

In the further trial of this cause, the defendants having read to the jury the following papers signed by the plaintiffs, and having proved that Daniel

Van Slyke was an engineer in the employ of said company, in the year 1829 and 1830, and as such engineer prepared and signed the monthly and final estimates of the work done by the parties, and the prices for which the plaintiffs were to be paid therefor, according to the terms contained in the said papers (copied in page ,) by their counsel, offered to read in evidence the deposition of Daniel Van Slyke, taken under the act of Congress of 1789, in a cause between the same parties, now pending on the imparlance docket of this court, the record of which is, in the words and figures following, to wit: (copied in page ,) which deposition and the certificate annexed thereto, are in the words and figures following, to wit: (copied in page ,) and the defendants proved that the said witness died about a year after taking his said deposition. That this suit was brought in Maryland, and afterwards by consent here, and docketed under an agreement of the parties (copied in page ,) which is the present suit. And it was further proved, that the said deposition was taken from the office from among the papers, in the aforesaid first suit, by the secretary of the defendants, in order to be carried to A. Arundle county court, where the cause was expected to be tried, to be used in such trial, and has been in his custody ever since.

It was also admitted that the deponent did return to the district after his said deposition was taken, but soon after again left the district, and is now dead. And the plaintiffs' counsel objected to the reading of said deposition, but the court allowed the same to be read in evidence, to which plaintiffs except, and pray the court to sign and seal this bill of exceptions; which is accordingly done, this 22d day of May, 1834.

W. CRANCH. [SEAL.]
B. THRUSTON. [SEAL.]
JAMES S. MORSELL. [SEAL.]

Plaintiffs' fourth exception.

In the further trial of the said issues, and after the evidence stated in the preceding exceptions, had been given, the defendants offered, in evidence, the following proposals (copied in page ,) admitted to be signed in the hand writing of one of the plaintiffs, and then proved by John P. Ingle; that the said proposals were brought by one of the plaintiffs to the office of the defendants, who handed the same to an officer of the said company, authorised to receive such papers, as their proposals for the work mentioned therein; that the said proposals were on the 14th day of March, 1829, laid before the president and directors of the said company and a regular meeting of the board, who, thereupon, by vote of the said board, accepted the same, and caused an entry to be made in their record book of their proceedings of that day, in the words following: "the following contracts were declared" (here follows an enumeration of the locks mentioned in the proposals). That after the entry as aforesaid was made, and on the same day, the said witness communicated to the plaintiffs that their said proposals were excepted, and further proved by Mr. Barnard, the clerk of the defendants; that the papers now annexed to the said proposals were prepared and filled up according to the said proposals and annexed thereto, and executed by the plaintiffs, in the manner as now appears in the hand-writing of one of the plaintiffs, and left in his possession by the said plaintiffs; which papers, so annexed to said proposals, are in the words and figures following, to wit.:

copied in page ,) and the defendants further proved, that the said plaintiffs, thereupon, in fact, assumed upon themselves the construction of, and did construct, the said locks, under the superintendence and direction of the engineers and officers of the said company; that the said engineers, in pursuance of their duty, from time to time, made monthly estimates of the work done by the said plaintiffs, on the said locks, to which they affixed the prices stipulated in the said proposals, which said monthly estimates the said plaintiffs, or some of them, brought to the office of the said defendants, and received payment for the same, at such prices, without objection; whereupon, the defendants, by their counsel, prayed the court to instruct the jury, that, if they believe the evidence as aforesaid, the said plaintiffs are not entitled to charge the said defendants, or to recover, in this action, any greater prices for the said work than the said stipulated prices, which instruction the court gave as prayed; to which instruction the plaintiffs, by their counsel, objected, but the court gave the same to the jury, to which the plaintiffs excepted, and pray the court to sign and seal this bill of exceptions; which is done accordingly, this 22d day of May, 1834.

W. CRANCH. [SEAL.]
BUCKNER THRUSTON. [SEAL.]
JAMES S. MORSELL. [SEAL.]

Plaintiffs' Fifth Exception.

In the further trial of this cause, and after the evidence and instructions stated in the preceding bills of exception had been given, the defendants further offered evidence, that on the 4th day of May, when the paper aforesaid, entitled articles of agreement, was signed by one of the plaintiffs, in the name of all the plaintiffs as aforesaid, an estimate of their work previously executed, made by the resident engineer, was brought by one of them to the office of the defendants, and the amount thereof paid to them by the defendants, the plaintiffs, having been first required by the defendants to sign the said papers, entitled articles of agreement, and a bill of sale conformably with one of the said articles, was at the same time executed by one of said plaintiffs, (copied in page ,) and the defendants then prayed the court to instruct the jury that, in estimating the compensation to which the plaintiffs are entitled, for any modification reducing or increasing the cost of the said locks, the amount thereof is to be ascertained in the manner prescribed by the papers called articles of agreement, to wit: by the engineer deputed by the said defendants; and that the extent and value of said modifications so fixed by said Daniel Van Slyke, in the paper marked No. 8, is binding on said plaintiffs, unless the plaintiffs can show errors therein, or that the said estimate was made by the said engineer without having the claims of plaintiffs on that subject, or fraudulently, which the court gave; to which the plaintiffs except, and pray the court to sign and seal this bill of exceptions; which is done accordingly this 23d May, 1834.

W. CRANCH. [SEAL.]
JAMES S. MORSELL. [SEAL.]

Plaintiffs' Sixth Exception.

In the further trial of the issues, and after all the evidence and the opinions in the preceding exceptions stated had been given, the defendants, in order to prove that the plaintiffs agreed to take a quantity of stone as pay-

ment in part for the work and labour mentioned in the declaration, and that they did so take it, offered to prove, by Mr. Ingle, the secretary of the defendants, that, before the plaintiffs' proposals had been offered and accepted, they were notified by the said witness that there was a quantity of stone got out and prepared by one Maynard, a former contractor on the same locks, who had abandoned the work and assigned the said stone to the company, and that if they made proposals which should be accepted, they would be required to take the said stone without saying at what price; and that after the plaintiffs commenced the said work, they stated to the said witness that they wished to settle with said Maynard for what was due to him on the said stone, by which the witness understood them to mean the twenty per cent. which the said Maynard had forfeited to the company by his abandonment of his contract.

To the admission of which testimony of the said witness the plaintiffs objected, but the court overruled their objection, and admitted the said testimony to be given to the jury. To the admission of which testimony the plaintiffs by their counsel excepted; and this, their bill of exceptions, is signed, sealed, and ordered to be enrolled this 23d day of May, 1834.

W. CRANCH, [SEAL.]
B. THRUSTON, [SEAL.]

Plaintiffs' 7th Exception.

In the further trial of the issues in this cause, and after the evidence had been given as stated in the preceding bills of exception, and after the court had given the opinions therein stated, the plaintiffs, by their counsel, offered in evidence to the jury the following order of the board of 8th April, 1829, (copied in page ,) and also the report of the president thereon of May 27, 1829, (copied in page ,) and then offered to prove, that after passing the said order, and some time in June, 1830, the president of the company stated, upon an application to him by an agent of the plaintiffs, that he considered them entitled to additional compensation beyond the contract price for the works they were then constructing, and that they should be allowed therefor a fair and reasonable compensation; which answer was given to the plaintiffs, who went on upon this assurance to complete the said work.

To this evidence the defendants objected, and the court sustained the objection, and refused to allow the same to be given in evidence; to which refusal the plaintiffs, by their counsel, except, and pray the court to sign and seal this bill of exceptions; which is done accordingly, this 24th May, 1834.

W. CRANCH, [SEAL.]
B. THRUSTON, [SEAL.]

Plaintiffs' 8th Exception.

And the plaintiffs, (after the evidence in the aforesaid bills of exception had been given,) further offered to prove that an agent of the plaintiffs, in June, 1830, called on the president of the company and on Phineas Janny, one of the directors of the company, and had a full conversation as to the work executed on the said locks, and which the plaintiffs were then executing, and that the aforesaid president stated, that he knew the said prices at which the plaintiffs had proposed to do the work were too low, and that they ought to have additional compensation therefor, and that they might

rest assured that such compensation would be made to them; but that no arrangement could be made for that purpose until they had completed the work.

And that the said Janny stated, that, on the completion of the work, he should act for the board as he would for himself, and not require any man to do any work without compensation; and the plaintiffs offered to prove that these interviews were in consequence of claims for relief from the plaintiffs, which the plaintiffs had determined to lay before the company at the public meeting of stockholders, in June, 1830, which were reduced to writing and handed to the president of the company, who had promised to introduce it to the said meeting and advocate its allowance; and that, on the morning of the intended meeting of stockholders, the board had a meeting, and after the meeting of the board the said Janny stated to the witness that the board had considered the matter, and that they would prefer the subjects not being introduced to the meeting of the stockholders, as they conceived that the board had full power over the subject, and that the president of the board concurred in these views, and stated that the board had full power to act, and would act on the subject: that these communications were stated to the plaintiffs, who, thereupon, determined to make no application to the stockholders, but to go on with the work, which they did; to which evidence the defendants by their counsel objected, and the court sustained the objection, and refused to let the said evidence be given to the jury; to which refusal the plaintiffs, by their counsel, except, and pray the court to sign and seal this bill of exceptions; which is done accordingly, this 24 May, 1834.

W. CRANCH, [SEAL.]
B. THRUSTON, [SEAL.]

Plaintiffs' 9th Exception.

The plaintiffs, by their counsel, prayed the court to instruct the jury that the plaintiffs are not concluded by the prices set forth in the proposals offered in evidence by the defendants; if the jury should be satisfied from the whole evidence, that the stated prices for the work set forth in said proposals, were based upon erroneous estimates, previously made out and exhibited by the defendants or their lawful agents to the plaintiffs, of the quantities and prices of materials, and the value of labor and provisions necessary to be used and employed in the construction of said locks, and the works appurtenant thereto, in which case it is competent for the jury to make such allowance to the plaintiffs, over and above the said stated prices set forth in said proposals, as they may think the plaintiffs' work, labor, and materials worth, and are not bound to the price per foot lift of said locks stated in said proposals. Which instruction the court refused to give. To which refusal the counsel for the plaintiffs except; and this, their bill of exceptions, is signed, sealed, and ordered to be enrolled, this 26th day of May, 1834.

W. CRANCH. [SEAL.]
B. THRUSTON. [SEAL.]
JAMES S. MORSELL. [SEAL.]

Plaintiffs' Tenth Exception.

And the plaintiffs, in the further trial of this cause, and after the evidence stated in the preceding exceptions had been given, offered to prove by a competent witness, John H. Beall, that he was on one occasion presents

at the locks which the plaintiffs were constructing for the defendants, some time in May, 1830, when he saw one of the plaintiffs there and a number of hands idle, and that while he was there the resident engineer, Daniel Van Slyke, and the president of the company, came to the said locks and entered into a conversation with one of the plaintiffs, who then stated to them that they were kept idle from the defendants failing to supply them with cement; that they were subjected to a great expense, and would be ruined by the works being thus delayed; and that said Van Slyke and said president then stated that the defendants had ordered their superintendant to supply them, and that they should receive a supply in a few days; that the said plaintiffs then threatened to abandon the work, and that the president of the company stated that they should not suffer if they would go on and finish the work. To which conversations being given in evidence the defendants, by their counsel, objected; and the court sustained the said objection, and refused to permit the said evidence to be given; to which refusal the plaintiffs by their counsel except, and pray the court to sign and seal this bill of exceptions; which is done accordingly, this 27th day of May, 1834.

W. CRANCH. [SEAL.]
B. THRUSTON. [SEAL.]

Plaintiffs' Eleventh Exception.

And the plaintiffs, by their counsel, after the evidence stated in the preceding bills of exception had been given, and after the defendants had given evidence of quantities of cement delivered, from time to time, by the defendants to the plaintiffs, while engaged in the construction of the work for which they are charged, and the plaintiffs gave in evidence, two orders of the board, [here insert the orders in reference to the company's agreeing to furnish cement to the contractors] (copied in page ,) and the papers annexed to Dl. Van Slyke's deposition being read in evidence by defendants (copied in page) thereupon, the plaintiffs further prayed the court to instruct the jury, that the plaintiffs are not concluded by the prices set forth in said proposals, for the foot lift of said locks, if the jury should be satisfied, from the evidence, that the hydraulic cement to be used in the construction of said locks was agreed to be furnished by the defendants to the plaintiffs, of a quality equal to the New York cement, to be delivered in due season, and that the defendants failed to furnish the same at the times and of the quality agreed upon by them, but that it is competent for the jury, if they are satisfied of such failure on the part of the defendants, to allow to the plaintiffs such additional price per foot lift on said locks as was caused by the inferior quality of said cement, and the non-delivery thereof in due season, provided the jury should be satisfied that the decision upon the subject, by the company's engineer, in paper No. 10, annexed to his deposition, was made through fraud or mistake.

And also that the plaintiffs are entitled under the evidence aforesaid, offered by plaintiffs and defendants, to $100 a lock in addition to the contract price of the work, for the extra cost incurred by the company's failure to furnish cement as they had agreed to do, as ascertained by Dl. Van Slyke, in his report No. 10; and if the jury should be satisfied from the evidence that such estimate has been made out through mistake or fraud, then the plaintiffs are not concluded by said estimate, but the jury may now allow what the said engineer ought to have allowed, which the court refused. And the defend-

ants, by their counsel, prayed the court to instruct the jury that the plaintiffs are not entitled to recover damages under either of the counts in the declaration in this cause, by reason of any failure on the part of the defendants to deliver cement to the plaintiffs for the prosecution of their work on the locks contracted to be built by them, which the court gave as prayed.

To which refusal and opinion, and to the instruction so given on the prayer of the defendants, the plaintiffs except, and pray the court to sign and seal this bill of exception; which is done accordingly, this 28th May, 1834.

W. CRANCH, [SEAL.]
B. THRUSTON. [SEAL.]

Plaintiffs' Twelfth Exception.

And the plaintiffs, after all the evidence aforesaid in the preceding bills of exception stated had been offered by plaintiffs and defendants, further offered to prove that the plaintiffs, in consequence of the order to hasten the work as stated in judge Wright's deposition, did hire for the completing their work from 70 to 75 additional hands, at a price of 33⅓ in advance of former prices, and did pay the same hands at that rate from the beginning of May till the middle of July, 1830; and prayed the court to instruct the jury that, if they believed from the evidence that the said advanced wages were so paid to the said labourers at the application of defendants, and in order to have the water let into the locks by the 4th of July, that then it is competent for the plaintiffs to recover in this action what they so paid, and the defendant prayed the court to instruct the jury that the plaintiffs are not entitled to recover under any of the counts in the declaration in this cause, for any damage incurred by the plaintiffs in consequence of their having been required by the defendants to finish the locks contracted to be built by them by the 4th day of July, 1830. And the court, thereupon, refused to give the instruction so asked by plaintiffs, and gave the instruction so asked by defendants, to both which the plaintiffs except; and this their bill of exceptions, is signed, sealed, and ordered to be enrolled, this 29th May, 1834.

W. CRANCH. [SEAL.]
JAMES S. MORSELL. [SEAL.]

Test: W. BRENT, *Clerk.*

And whereas, afterwards, to wit: On the sixth day of October, in the year of our Lord one thousand eight hundred and thirty-four, the said Chesapeake and Ohio Canal Company, by their attorney aforesaid, produced and filed in court here the United States writ, for the correcting of errors of and upon the judgment aforesaid, directed to the judges of the circuit court of the District of Columbia, in the county of Washington; and in pursuance thereof, and according to the form and effect of the law in such case made and provided, a transcript of the record of proceedings of the judgment aforesaid, and all things thereunto relating, with the writ of error aforesaid, citation, and a copy of the appeal bond, hereto annexed, is hereby transmitted to the said Supreme Court accordingly.

In testimony whereof, I have hereunto subscribed my name, and affixed the public seal of the said circuit court for the county aforesaid, at the city of Washington, this sixth day of October, Anno Domini, 1834.

[L. S.]

W. BRENT, *Clerk.*

UNITED STATES OF AMERICA,
District of Columbia, Washington County, } ss.

To Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, greeting:

You are hereby cited and admonished to be and appear at a Supreme Court of the United States, to be held at Washington, on the second Monday of January next, pursuant to a wit of error, filed in the clerk's office of the circuit court of the United States for the District of Columbia, in the county of Washington, wherein the Chesapeake and Ohio Canal Company are plaintiffs in error, and you are defendants in error, to show cause, if any there be, why the judgment rendered against the said Chesapeake and Ohio Canal Company, as in the said writ of error mentioned, should not be corrected, and why speedy justice should not be done to the parties in that behalf.

Witness the honorable William Cranch, chief judge of the circuit court for the District of Columbia, this eighth day of July, 1834.

Service acknowledged by F. S. Key, esq., attorney for defendants in error.

UNITED STATES OF AMERICA:

The President of the United States to the judges of the circuit court of the United States for the District of Columbia, sitting for the county of Washington, greeting;

Because, in the record and proceedings, as also in the rendition of the judgment of a plea which is in the said circuit court, before you or some of you, between Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, plaintiffs, and the Chesapeake and Ohio Canal Company, defendants, a manifest error hath happened, to the great damage of the said defendants, as by their complaint appears; we, being willing that error, if any hath been, should be duly corrected, and full and speedy justice done to the parties aforesaid in this behalf, do command you, if judgment be therein given, that, under your seal, distinctly, you send the record and proceedings aforesaid, with all things concerning the same, to the Supreme Court of the United States, together with this writ, so that you have the same at Washington on the second Monday of January next, in said Supreme Court to be then and there held; and that the records and proceedings being inspected, the said Supreme Court may cause further to be done therein to correct that error, what of right and according to the laws and custom of the United States should be done.

Witness the Hon. JOHN MARSHALL, Chief Judge of said Supreme Court of the United States.

Issued this eighth day of July, 1834.

W. BRENT,
Clerk Circuit Court Dis. Col., county of Washington.

Know all men by these presents, that we, the Chesapeake and Ohio Canal Company, and George C. Washington, John J. Abert, George Bender, William Gunton, John P. Ingle, and Walter Smith, are held and firmly bound unto Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, in the full and just sum of fifty thousand dollars, current money, to be paid to the said Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, their heirs, executors, administrators, or assigns, to which payment, well and truly to be made, we bind ourselves and each of us,

our and each of our heirs, executors, and administrators, jointly and severally, firmly, by these presents. Sealed with our seals, and dated this 7th day of July, in the year one thousand eight hundred and thirty-four.

Whereas, lately, at a circuit court of the United States for the District of Columbia, sitting for the county of Washington, in a suit depending in the said circuit court, wherein the said Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman were plaintiffs, and the Chesapeake and Ohio Canal Company were defendants, judgment was rendered against the said defendants; and the said defendants having obtained a writ of error, and filed a copy thereof in the clerk's office of the said circuit court, to reverse the judgment in the aforesaid suit, and a citation to the said Abraham Knapp, Benjamin Ford, Henry Acker, and Fredus Chapman, citing and admonishing them to be and appear at a Supreme Court of the United States, to be held on the second Monday of January next:

Now, the condition of the above obligation is such, that if the said Chesapeake and Ohio Canal Company shall prosecute said writ to effect, and answer all damages and costs if they fail to make good their plea, then the above obligation to be void, else to remain in full force and virtue.

In behalf of the Ches. & O. Canal Co.,

G. C. WASHINGTON. [Seal of the Ches. & O. Canal Co.]

President of the Chesapeake & Ohio Canal Company.

G. C. WASHINGTON. [seal.]
JOHN J. ABERT. [seal.]
GEORGE BENDER. [seal.]
W. GUNTON. [seal.]
JOHN P. INGLE. [seal.]
W. SMITH. [seal.]

Signed, sealed, and delivered in the presence of
ROBT. BARNARD.

Witness:

ROBT. BARNARD.

This bond and sureties are approved, July 8th, 1834.

W. CRANCH.